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Executive Summary

This agricultural assessment report has been prepared on behalf of the proponent, Scott Colvin, and covers various aspects of the proposed visitor accommodation at 157 Blackwood Creek Road, Blackwood Creek TAS 7301.

The property in question covers approximately 651.5ha of land and does not contain any prime agricultural land.

The proposed farm stay visitor accommodation is located on Class 6 land, which is unsuitable for cropping, with severe limitations to pastoral use. The land immediately surrounding the proposed development is Class 5 land that is unsuitable for cropping, with moderate limitations to pastoral use.

The proposed development utilises less than 0.05% of the total property area (approx. 0.025ha of 651.5ha). The balance of the property (99.95%) will be retained for its current agricultural land use activities which are based on grazing and irrigated cropping enterprises. The proposed development does not significantly alter the existing interaction of the property with surrounding land use and has appropriate setbacks with topographic and vegetative buffers which minimise any potential adverse impacts on adjoining agricultural land uses.

This report supports the proposed visitor accommodation as it does not diminish the productive capacity of the land and will not negatively affect agricultural land use on the property itself or neighbouring land. Therefore, the proposed development will not confine, constrain or interfere with any current or future agricultural or primary industry land use activities on adjoining land.

1 Purpose

This report has been undertaken on behalf of Scott Colvin (the proponent) to support an application for visitor accommodation at 157 Blackwood Creek Road, Blackwood Creek TAS 7301.

The document provides an agricultural assessment of the property in question and reports on how the proposal complies with provisions of the Northern Midlands Interim Planning Scheme 2013. This report reviews the current agricultural usage of the property and the surrounding area in relation to the Land Capability and Land Classification. This includes soils, aspect, topography, water resource, economic feasibility, and impact of the proposed development in relation to agricultural activities.

It is noted that the visitor accommodation (dwelling) area and setback distances referred to in this report is an approximation only (based on available data and information received) and is subject to survey.

1.1 General Overview

1.1.1 Land capability

The currently recognised reference for identifying land capability is based on the class definitions and methodology described in the Land Classification Handbook, Second Edition, C.J Grose, 1999, Department of Primary Industries, Water and Environment, Tasmania.

Most agricultural land in Tasmania has been classified by the Department of Primary Industries and Water at a scale of 1:100,000, according to its ability to withstand degradation. A scale of 1 to 7 has been developed with Class 1 being the most productive for agriculture and resilient to degradation and Class 7 the least suitable to agriculture. Class 1, 2 and 3 are collectively termed “prime agricultural land”. For planning purposes, a scale of 1:100,000 is often unsuitable and a re-assessment is required at a scale of 1:25,000 or 1:10,000. Factors influencing capability include elevation, slope, climate, soil type, rooting depth, salinity, rockiness and susceptibility to wind, water erosion and flooding.

1.1.2 Report author(s)

In providing the opinion enclosed here, it is to be noted that Faruq Shahriar Isu, holds a Master of Applied Science (Agricultural Science) and has over two years’ experience in agribusiness and agricultural research in Tasmania. Faruq is trained to carry out land capability and suitability assessments. He has previously used these skills to select trial sites for agricultural research and more recently engaged to undertake agricultural assessment within several municipalities in northern Tasmania.

1.1.3 Northern Midlands Interim Planning Scheme 2013

The Northern Midlands Interim Planning Scheme 2013 sets out the requirements for use and development of land in the Devonport municipality in accordance with the *Land Use and Approvals Act 1993*.

2 Property Details

2.1 Location

The "Nosswick" property at 157 Blackwood Creek Road, Blackwood Creek TAS 7301, is owned by Nosswick Pty. Ltd. (Figure 1).

Table 1 Property location identification details

Address	Property ID	Title Reference	Hectares *(Approx.)*
157 Blackwood Creek Road, Blackwood Creek TAS 7301	2928830	109824/1	651.5ha

The property (title reference 109824/1) is located north of the Blackwood Creek locality and Brumbys Creek flows along the southern boundary of the property. The topography varies from flat and undulating plains to low hills formed on Jurassic dolerite, trending in a northwest/southeast direction (Figure 2). Minor tributaries and streams intercept the property through the eastern, western and northern boundaries and Brumbys Creek flows along the southern property boundary. The property is accessed from Blackwood Creek Road.

The property is held as private freehold land and immediately surrounded by the same, with a patch of conservation covenant in the south (Figure 3).

The property is zoned Rural Resource under the Northern Midlands Interim Planning Scheme 2013 and immediately surrounded by the same (Figure 4).

The property is in the Whitemore Irrigation District.

The vegetation present on the property is predominantly improved pastures, with seasonal cropping (as per grass seeds and peas) grown on the land. There are patches of native vegetation (described below) and established shelterbelts of trees and shrubs.

There are Threatened Native Vegetation Communities (TNVC 2020) of *Eucalyptus viminalis* wet forest and Riparian scrub along the southern boundary and *Eucalyptus amygdalina* inland forest and woodland along the northeast boundary of the property (Figure 5).

There are Tasmanian Reserve Estate (Management Agreement) within the north and Conservation Covenant land along the southern boundary of the property (Figure 6).

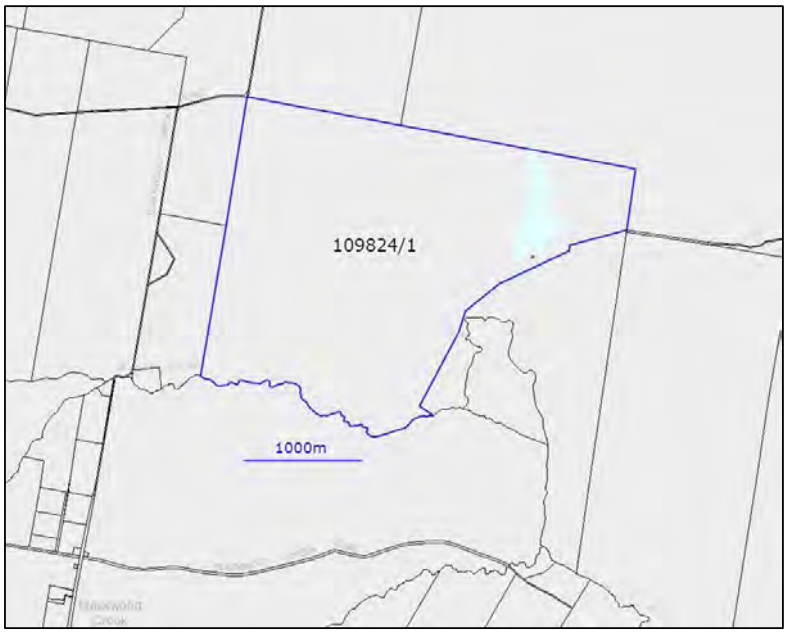

Figure 1. Location of the property, outlined in blue. Red area indicates approximate location of proposed visitor accommodation at the property (Source: The LISTMap).

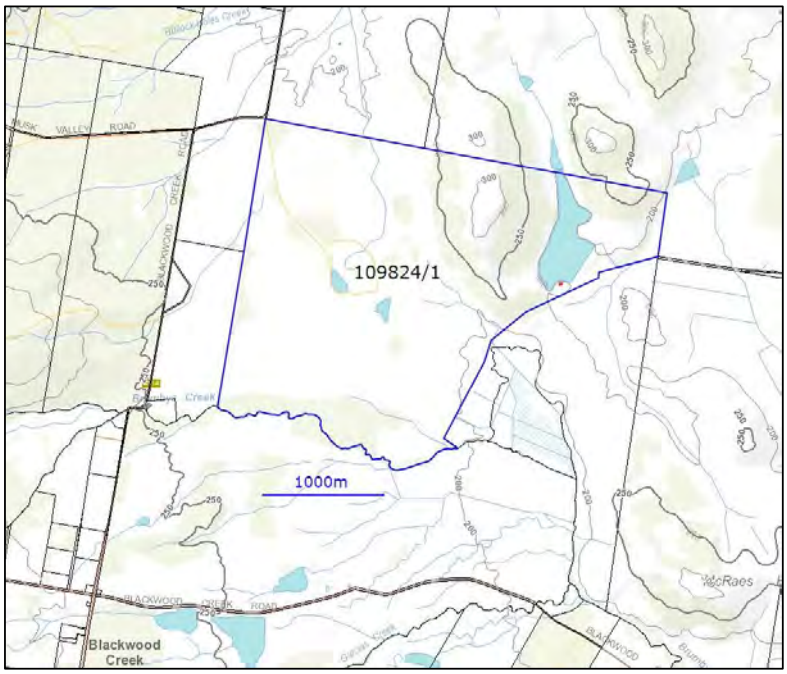

Figure 2. Topographic map of the property (Source: The LISTMap).

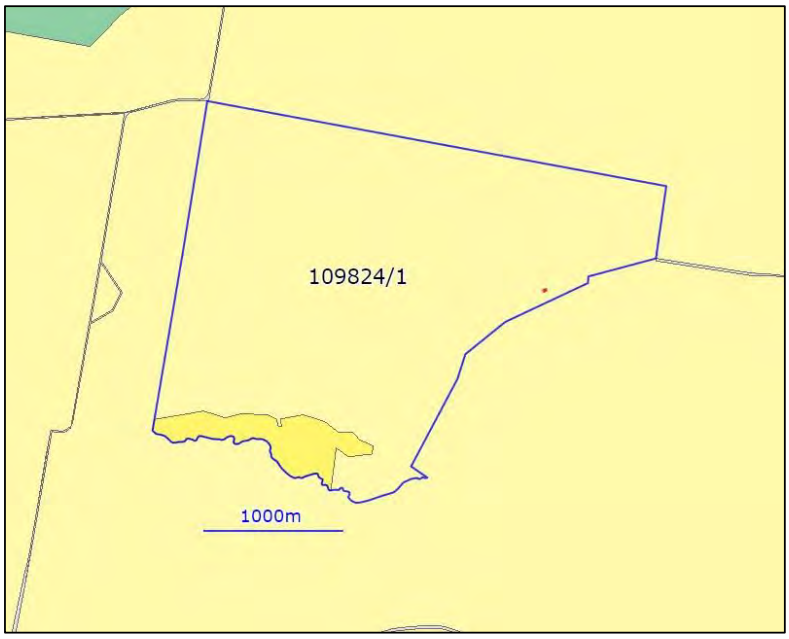

Figure 3. Land tenure of the property is private freehold (pale yellow) and surrounded by the same. There is conservation covenant near southern boundary of the property (dark yellow) (Source: The LISTMap).

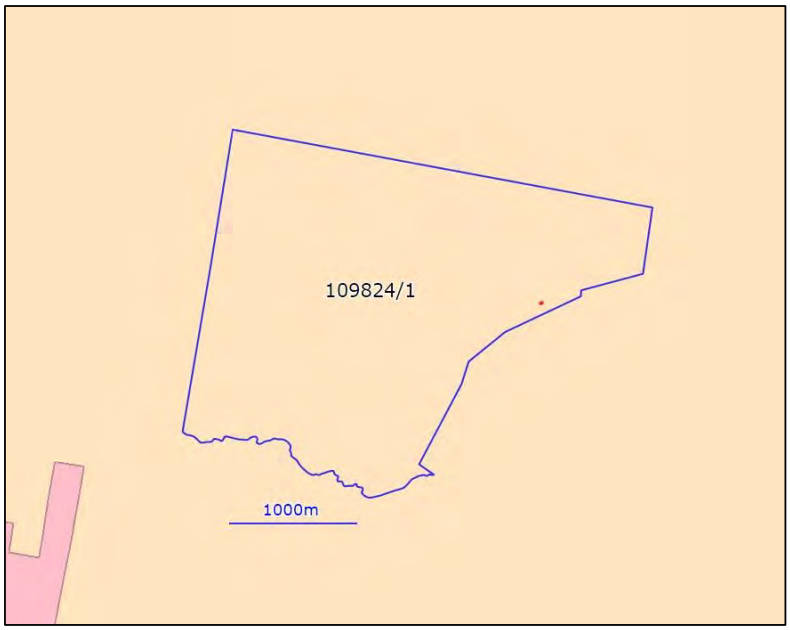

Figure 4. Property is zoned Rural Resource (pale pink) under the Northern Midlands Interim Planning Scheme. Bright pink area at bottom left corner of map indicates Rural Living Zone (Source: The LISTMap).

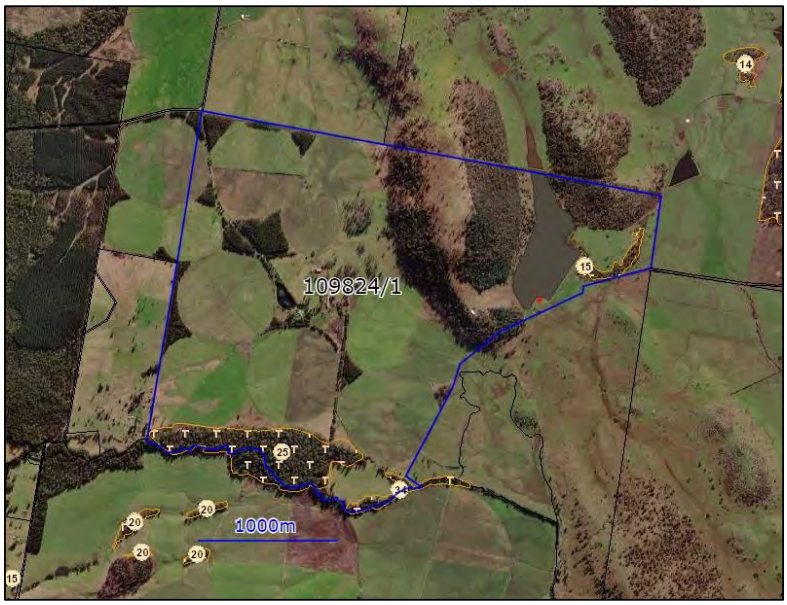

Figure 5. Threatened Native Vegetation Communities (orange outlines) of *Eucalyptus viminalis* wet forest (25) and Riparian scrub (34) along the southern boundary and *Eucalyptus amygdalina* inland forest and woodland (15) along the northeast boundary of the property (Source: The LISTMap).

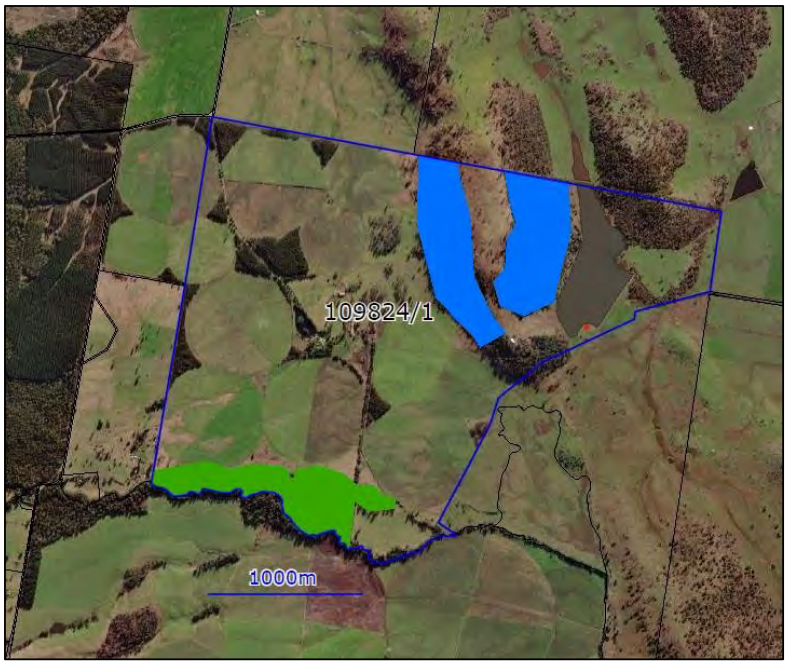

Figure 6. Management Agreement under Tasmanian Reserve Estate (blue) and Conservation Covenant (green) present at the property (Source: The LIST Map).

3 Land Capability

Land capability of the property was assessed according to the Tasmanian Land Capability Classification System (Grose, 1999). Land is ranked according to its ability to sustain a range of agricultural activities without degradation of the land resource. Class 1 land is considered to be prime agricultural land and Class 7 land is unsuitable for agriculture due to severe limitations. A wide range of limitations are considered, and the most significant limitation determines its final classification. Limitations in relation to soils include stoniness, topsoil depth, drainage and erosion hazard. Limitations to topography include slope and associated erosion hazard.

The property consists of Class 4, 4+5 and 5 land according to the LIST (Figure 7). For the purpose of this report, the field check for land capability was focused on the proposed visitor accommodation site. The land surrounding the area was deemed to be Class 5 and 6 (Figure 8). Both land classes are unsuitable for cropping, with moderate limitations for grazing on Class 5 land and severe limitations on Class 6 land.

The land capability of site for the proposed visitor accommodation is Class 6 land. The area is situated on a low hill with abundant rock outcrops and prone to moderate risk of wind and water erosion if soil is left bare. The surrounding low-lying Class 5 land is prone to wetness from surface runoff and watercourses. There is a watercourse to the east on the lower lying area that contributes to localised areas that are susceptible to waterlogging during winter and after periods of heavy rainfall.

The primary limitation of all land classes is erosion, based on topography, landform and soil type.

Class 5 land is defined as:

This land is unsuitable for cropping, although some areas on easier slopes may be cultivated for pasture establishment or renewal and occasional fodder crops may be possible. The land may have slight to moderate limitations for pastoral use. The effects of limitations on the grazing potential may be reduced by applying appropriate soil conservation measures and land management practices.

Class 6 land is defined as:

Land marginally suitable for grazing because of severe limitations. This land has low productivity, high risk of erosion, low natural fertility or other limitations that severely restrict agricultural use. This land should be retained under its natural vegetation cover.

The key land capability limitations associated with this property are:

- Erosion (e): caused by wind and/or water if soils are exposed or left bare. Recommended to keep under pasture or natural vegetation cover.
- Wetness (w): caused by waterlogging along watercourses and drainage channels and surface run offs accumulating in depressions.
- Soil (s): caused by shallow topsoil with presence of course fragments and limiting layer or rocks.

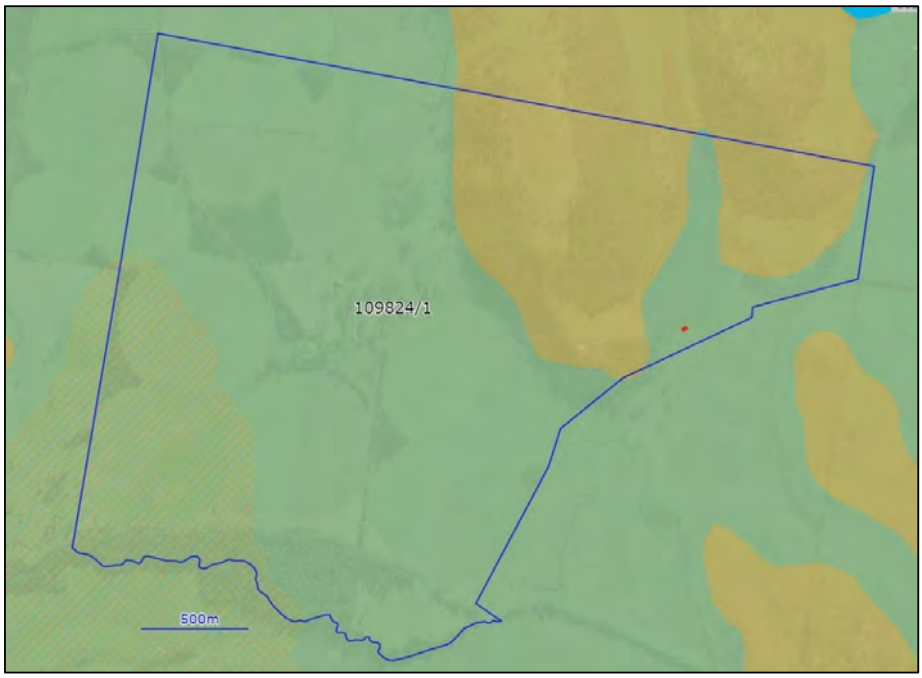

Figure 7. LIST land capability of the property is Class 4 (green), Class 4+5 (green and brown stripe) and Class 5 (brown) (Source: The LISTMap).

Figure 8. Land capability immediately surrounding proposed visitor accommodation dwelling (red rectangle) is Class 6 (brown). Flatter areas to the south and slope to the east is Class 5 (Olive). Dam area has been excluded from land capability mapping, shown in grey (Source: The LISTMap).

Table 2 Land capability assessment over titles (field checked area mentioned)*.**

Land Capability Class (ha)	Land Characteristics							
	Geology & Soils	Slope (%)	Topography & Elevation	Erosion Type & Severity	Soil Qualities	Agricultural Versatility	Main Land Management Requirements	Climatic Limitations
5 (Approx. 5.9ha*)	Shallow. grey-brown loam or sandy loam surface overlying a light grey fine silty sandy loam subsurface. Dolerite fragments and stones common throughout profile. Some dolerite outcrops. Eastfield Association.	0-10%	Undulating plains and low hill slopes. 190-230m above sea level.	Low to moderate sheet erosion. Moderate wind erosion.	Imperfectly drained to moderately well drained and slowly permeable soil.	Unsuitable for cropping. Suitable for pastoral use with moderate limitations.	Avoid situations that lead to the exposure of bare soil, therefore maintain sufficient ground cover. The risk of compaction in winter from machinery and stock increases significantly during periods of water saturation and logging.	Minor climatic limitations. This region experiences cold winter and warm summer conditions. Receives an average of 835mm annual rainfall, can experience 40 frost days annually, 1050 GDD (October – April) and 1130 chill hours (May – August).

Land Capability Class (ha)	Land Characteristics							
	Geology & Soils	Slope (%)	Topography & Elevation	Erosion Type & Severity	Soil Qualities	Agricultural Versatility	Main Land Management Requirements	Climatic Limitations
6 (Approx. 2.2ha*)	Shallow, red - reddish brown, loam topsoil over clay, developed on dolerite hills to black sandy loam overlying light grey fine sand subsurface over compacted clay on foothills. Ironstone nodules and stones common throughout profile. Frequent dolerite outcrops. Eastfield Association.	0-5%	Undulating low hills and slopes. 200m above sea level.	Moderate sheet and wind erosion.	Moderately well drained and slowly permeable.	Unsuitable for cropping with severe restrictions to pastoral use.	Avoid situations that lead to the exposure of bare soil, therefore maintain sufficient ground cover. The risk of compaction in winter from machinery and stock increases significantly during periods of water saturation and logging.	Minor climatic limitations. This region experiences cold winter and warm summer conditions. Receives an average of 835mm annual rainfall, can experience 40 frost days annually, 1050 GDD (October – April) and 1130 chill hours (May – August).

3.1 Soils

The soils surrounding the proposed development area on the property are black to reddish brown, sandy loam to loam shallow topsoil, over grey fine sandy to silty sandy loam on subsurface, developed on Jurassic dolerite.

The topography varies from flat and undulating plains to low hills trending in a northwest/southeast direction. The soils are imperfectly drained on depressions, to moderately well drained on hills, and generally slowly permeable.

The soil types are consistent with the geology, topography and elevation of the area. These shallow loam to sandy loam soils generally have low fertility and good drainage. The soils on this area of the property are unsuitable for cropping due to varying sizes of rock present throughout the profile and frequent outcrops of dolerite rocks, creating a limiting layer. Intensive grazing immediately following heavy rainfall, when soils are saturated, can lead to compaction. The soils on depressions and flatter areas, particularly along watercourses and drainage channels, can remain wet for prolonged periods.

The key limitations associated with the soil type are:

- Erosion (e): caused by wind and/or water if soils are exposed or left bare. Recommended to keep under pasture or natural vegetation cover.
- Wetness (w): caused by waterlogging along watercourses and drainage channels and surface run offs accumulating in depressions.
- Soil (s): caused by shallow topsoil with presence of course fragments and limiting layer or rocks.

Image 1. Eastfield SPC soil profile 1 on Class 6 land. Shallow (approx. 10cm), red - reddish brown, loam topsoil over clay, developed on dolerite hills. Presence of stones and dolerite fragments throughout profile with limiting layer of rocks (taken at site assessment on 29/04/22).

Image 2. Varying sizes of stone from the shallow soil profile 1 in Class 6 land (taken at site assessment on 29/04/22).

Image 3. Eastfield SPC soil profile 2 on foothills of Class 6 land. Shallow (approx. 10cm), black sandy loam overlying light grey fine sand subsurface on compacted clay. Presence of stones and ironstone nodules throughout profile (taken at site assessment on 29/04/22).

Image 4. Frequent and abundant rocky outcrops on Class 6 land, near proposed development area (taken at site assessment on 29/04/22).

Image 5. Eastfield SPC Soil profile 3 on Class 5 land to the east of proposed development. Shallow, grey-brown sandy loam surface overlying a light grey fine sandy loam subsurface. Presence of stones and dolerite fragments throughout profile with limiting layer of rocks (taken at site assessment on 29/04/22).

Image 6. Class 5 land to the east of proposed development. Overhead powerlines pass through in this section of land (taken at site assessment on 29/04/22).

Image 7. Eastfield SPC Soil profile 4 on Class 5 land to the west of proposed development. Grey-brown loam surface overlying a light grey fine silty, sandy loam subsurface. Presence of course fragments throughout (taken at site assessment on 29/04/22).

Image 8. Class 5 land to the west of proposed development. This area is prone to waterlogging (taken at site assessment on 29/04/22).

Image 9. Overhead powerlines and electric pole near proposed development site (taken at site assessment on 29/04/22).

Image 10. Existing laneway along southern property boundary near proposed development site (taken at site assessment on 29/04/22).

4 Proposed Development

4.1 Visitor accommodation

The proponents propose to build visitor accommodation on the Class 6 land at the southern end of the approximately 1155ML irrigation dam on the property. The area for the proposed development has been strategically selected to avoid any potential conflict with agricultural activities on the property and adjoining property. The location is atop a low hill, approximately 40m south of the dam and away from the existing farm laneway. The area is not utilised for grazing due to presence of powerlines and abundant rocky outcrops.

The proposed dwelling for a farm stay visitor accommodation will allow the proponent to provide lodging to family members or seasonal farm labours to help out with on farm activities during peak times such as sowing and harvesting. During off peak times, the accommodation will be available for visitors in the region to enjoy a farm lifestyle experience, without interfering with on farm activities (Figure 9). The additional income from the visitor accommodation will be used towards maintenance and any surplus will be used to finance farm operations. The proposed area utilised by the dwelling (approx. 0.025ha or less than 0.05%) represents a negligible extent of the total property area (approx. 651.5ha) and is separated from agricultural activities by topographic and vegetative buffers. The proposal does not diminish the productive capacity of the land.

Figure 9. Approximate location of the proposed visitor accommodation at the property shown in red. Blue line indicates property boundary (Source: The LISTMap).

4.2 Setback distances

The setback distance of the proposed visitor accommodation from the southern title boundary is approximately 80m (Figure 10). All other boundaries are more than 800m away and not shown in the figure.

The setback of the proposed dwelling from adjoining agricultural land to the south is further aided by topography and existing farm laneway. This area of the property is not cropped or intensively grazed. Cropping and grazing paddocks to the east and west are separated from the proposed visitor accommodation by topography and vegetation, in addition to being more than 500m away.

Therefore, the setbacks along with topographic and vegetative buffers, reduces the risk of the agricultural land use conflicting with the visitor accommodation and vice versa.

Figure 10. Proposed dwelling for visitor accommodation (red fill) from southern title boundary (blue line) is setback approximate 80m (orange line). All other boundaries area more than 800m away (Source: The LISTMap).

5 Land Use Activity

5.1 Current agricultural activities conducted

The proponent currently conducts mixed enterprise of cropping and grazing activities at the property. There are approximately 10,000 sheep at the property and cropping enterprise includes grass seeds and peas. Both enterprises are operated in rotation with other landholdings, with cropping predominantly under irrigation. The property has 1485ML of water allocation, with an existing 1155ML capacity dam on site and another 212.6ML capacity proposed dam with the permit approved. The property was acquired in 1980s and current infrastructures include a residential dwelling, manager's residence, shearing, machinery and pump sheds, silos, irrigation mains, pivots and dam, stock water troughs and boundary and internal fencing.

5.1.1 Adjacent land use activity

To the north and east of the property is predominantly dryland grazing on improved pasture and to the west and south is a mix of irrigated cropping and both dryland and irrigated grazing on improved pasture.

5.2 Potential agricultural land use activity

5.2.1 Pastoral use

The property is suitable for pastural use with slight limitations on Class 4 land, moderate limitations on Class 5 land and severe limitation on Class 6 land. Irrigation is predominantly used for the cropping enterprise with some irrigated grazing paddocks. Based on the property's size, land capability, topography and in conjunction with growing season duration and rainfall and assuming the whole property is used for pasture (between cropping rotations), it would be reasonable to consider that it can support a potential carrying capacity of 22.43 DSE/ha for a property total of approximately 10,015 DSE/year.

Thus, it is reasonable to consider that the property has the potential to support 10,015 head of dry sheep which represents an approximate total annual gross margin of $450,675 (at a gross margin of $45/DSE) or $1,009.35/ha.

The proposed development would result in the loss of approximately 0.025ha of Class 6 land, which has negligible effect on the total potential carrying capacity (DSE/year) of the property. Therefore, the productive capacity of the grazing enterprise is not affected by the proposed visitor accommodation.

5.2.2 Cropping use

The Class 4 land on the property is suitable for restricted cropping and can be used for mixed farming, including various vegetables and broadacre crops on a two in 10-year rotation, supported by irrigation.

Gross margins will vary depending on the choice of crop (irrigated) and can range from $1,510 for grass seeds to $1,000 for peas (DNRET). The proposed development has no effect on the cropping enterprise as the area is unsuitable for cropping.

5.2.3 Perennial horticulture use

Although the topography, soil type and climate are potentially suitable to horticultural crops, to establish commercial horticultural enterprise on this property (including berries and viticulture) would require significant capital investment in infrastructure. The proponent has investment approximately $1.5 million in irrigation development for the existing enterprises at the property in the past two years. Any diversification of enterprises will dilute the resources on the farm and reduce land area of core enterprises, adversely affecting the existing enterprises.

5.3 Impact on agricultural activities and residential amenity of neighbouring land

The proposed visitor accommodation is strategically located near the existing dam on the property, with sufficient setbacks and aided by topographic and vegetative buffers. There are no changes in the boundary and interaction of the property with neighbouring land and there are no nearby dwellings. Therefore, the proposal will have no impact on the land use activities and residential amenities of the neighbouring agricultural land use within the Rural Resource Zone.

After inspecting the site (site assessment completed April 29th, 2022), it has been concluded that the proposed setback distances, in conjunction with the buffer created by topography and vegetation, are sufficient to prevent unreasonable conflict or interference of agricultural land use on residential amenity and vice versa within the property and in the greater area.

5.4 Impact of agricultural activity on neighbouring land to the proposed development

Normal agricultural activities are not expected to have any unreasonable impact on the proposed development and vice versa in the future. An assessment of the key risks is summarised in Table 5. This has been compiled on the basis that the neighbouring farm activities are likely to include cropping and livestock grazing.

Table 3 Potential risk from agricultural land use activities on neighbouring land

Potential Risk from Neighbouring Agricultural Land Activity	Extent of Risk & Possible Mitigation Strategy
1. Spray drift and dust	Risk = low. Existing buffer distances, topography and vegetation will help mitigate the impact of sprays and dust if applied under normal recommended conditions. Spraying events should be communicated in a timely manner to the inhabitants of the dwelling. The use and application of agricultural sprays must abide by the Tasmanian Code of practice for ground spraying 2014.
2. Noise from machinery, livestock and dogs	Risk = low. low. Some occasional machinery traffic will occur when working and undertaking general farming duties on adjacent land. This is mitigated by the topography and vegetation to the west and east.

3. Irrigation water over boundary	Risk = low. Irritation is not practiced on this part of the property or on the adjoining neighbouring land.
4. Stock escaping and causing damage	Risk = Low. Provided that boundary fences are maintained in sound condition and livestock are checked regularly.
5. Electric fences	Risk = Low. Mitigated by the proponent attaching appropriate warning signs on boundary fencing.

5.5 Impact of proposed development on agricultural activity of neighbouring land

The proposed visitor accommodation, in consideration with the buffer zones, physical barriers and agricultural land use, have all been assessed as low risk impact to agricultural activity on neighbouring land. These potential impacts are usually manifested as complaints that could be made by residents of nearby dwellings. Other risks to neighbouring agricultural activity are outlined in Table 6. Some of these risks rely on an element of criminal intent and it could well be argued that this is very much lower with inhabitants of the dwelling than with other members of the public.

Table 4 Potential risk from proposed development on neighbouring agricultural land use and activity

Potential Risk to Neighbouring Agricultural Land Activity	Extent of Risk & Possible Mitigation Strategy
1. Trespass	Risk = low. Mitigation measures include installation and maintenance of sound boundary fencing, lockable gates and appropriate signage to warn inhabitants and visitors about entry onto private land; report unauthorised entry to police.
2. Theft	Risk = low. Ensure there is good quality boundary fencing on neighbouring properties and appropriate signage to deter inadvertent entry to property; limit vehicle movements, report thefts to police.
3. Damage to property	Risk = low. As for theft.
4. Weed infestation	Risk = low. Risks are expected to be negligible, with the proponents committed to the productivity and sustainability of their property and weed control is a key activity. Biosecurity practices are followed with dirt covered vehicles washed down before visiting the property and vehicles staying on established gravel roads.
5. Fire outbreak	Risk = low. Fire risk can be mitigated by careful operation of outside barbeques and disposal of rubbish. A bushfire management plan may be required for the proposed development.
6. Dog menace to neighbouring livestock	Risk = low. Mitigated by ensuring that good communication is maintained between the proponent and residents of the neighbouring properties. Dogs would be managed as per the guidelines determined by the council.

5.6 Impact of proposed development on amenity of dwellings on nearby land

There are no residential dwellings on neighbouring land within 1km vicinity of the proposed visitor accommodation at 157 Blackwwod Creek Road, apart from the manager's residence at the subject property (Figure 9). There is no dwelling within 200m of the proposed dwelling for visitor accommodation (Figure 9). The nearest neighbouring amenity (manager's residence on property) from the proposed visitor accommodations is approximately 465m to the west and separated by trees and topography.

There is sufficient setback along with buffers created by woodland vegetation and topography. Thus, there would be no adverse impact on the amenity of nearby lands and vice versa.

Figure 11. No neighbouring dwellings apart from manager's residence (blue pin) at subject property within 1km (light blue circle) of proposed visitor accommodation (red area) (Source: The LISTMap).

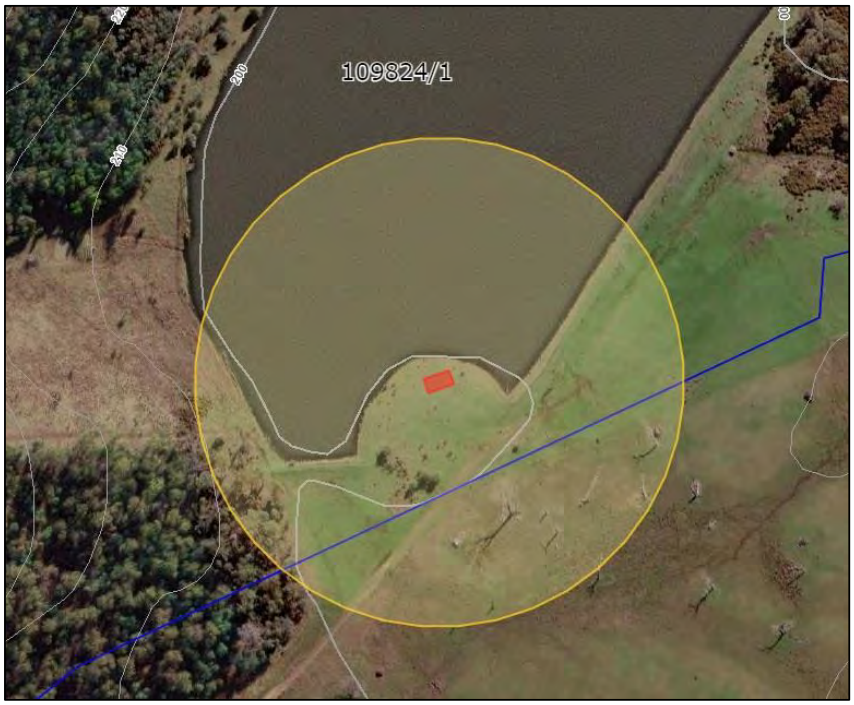

Figure 12. No neighbouring dwellings within 200m (yellow circle) of proposed visitor accommodation (red area) at the property (Source: The LISTMap).

5.7 Water storage and resources

The property is not serviced by TasWater for water and sewage (The LIST).

The property is in the Whitemore Irrigation District and consists of irrigation infrastructure such as irrigation mains, pivot irrigators and a 1155ML dam (with another proposed 212.6ML dam). There is a 1485ML irrigation water allocation from the scheme.

6 Planning Compliance Report – 26.0 Rural Resource Zone

6.1 Clause 26.1 Zone purpose

6.1.1 Clause 26.1.1 Zone purpose statement

Zone purpose statements:	Response:
26.1.1.1 To provide for the sustainable use or development of resources for agriculture, aquaculture, forestry, mining and other primary industries, including opportunities for resource processing. 26.1.1.2 To provide for other use or development that does not constrain or conflict with resource development uses. 26.1.1.3 To provide for economic development that is compatible with primary industry, environmental and landscape values. 26.1.1.4 To provide for tourism-related use and development where the sustainable development of rural resources will not be compromised.	21.1.1 The proposed visitor accommodation is located on Class 6 land at the property accounts for less than 0.05% (0.025ha of 651.5ha) of the total property area. The current agricultural land use at the property is not affected by the development. 26.1.1.2 The proposed visitor accommodation utilises 0.025ha of Class 6 land and does not diminish the productive capacity of the land nor change the interaction with surrounding agricultural land, as the location is on a small hilltop with rocky outcrops and situated next to the dam. This portion of the property is only intermittently grazed while rotating animals between paddocks to the east and west, separated by topography and woodland vegetation. Therefore, the proposal does not constrain or conflict with resource development uses. 26.1.1.3 The proposal does not affect the current agricultural land use and any surplus income from the proposed visitor accommodation will be invested in farm operations. The proponent is committed to the cropping and livestock enterprise at the property with significant investments (approx. $1.5million) for irrigation development to support the enterprises. 26.1.1.4 The proposed farm stay visitor accommodation will allow visitors to enjoy the bucolic setting and amenity. The land use interaction does not change as the proposed development is located on low land capability Class 6 land and has sufficient setbacks, aided by vegetation and topography. Therefore, sustainable development of rural resources will not be compromised.

6.1.2 Clause 26.1.2 Local area objectives

Local area objectives:	Response:
a) Primary Industries: Resources for primary industries make a significant contribution to the rural economy and primary industry uses are to be protected for long-term sustainability. The prime and non-prime agricultural land resource provides for variable and diverse agricultural and primary industry production which will be protected through individual consideration of the local context. Processing and services can augment the productivity of primary industries in a locality and are supported where they are related to primary industry uses and the long-term sustainability of the resource is not unduly compromised. b) Tourism Tourism is an important contributor to the rural economy and can make a significant contribution to the value adding of primary industries through visitor facilities and the downstream processing of produce. The continued enhancement of tourism facilities with a relationship to primary production is supported where the long-term sustainability of the resource is not unduly compromised. The rural zone provides for important regional and local tourist routes and destinations such as through the promotion of environmental features and values, cultural heritage and landscape. The continued enhancement of tourism facilities that capitalise on these attributes is supported where the long-term sustainability of primary industry resources is not unduly compromised. c) Rural Communities Services to the rural locality through provision for home-based business can enhance the sustainability of rural communities. Professional and other business services that meet the needs of rural populations are supported where they accompany a residential or other established use and are located appropriately in relation to settlement activity centres and surrounding primary industries such that the integrity of the activity centre is not undermined and primary industries are not unreasonably confined or restrained.	a) Primary Industries: The land use interaction is not affected by the proposed development. The proposed dwelling would be utilised as farm stay visitor accommodation and any surplus income would be put towards farm operations and maintenance. It is located on Class 6 land on an agriculturally insignificant part of the property and utilises less than 0.05% of the total property area. The existing agricultural land use is entirely retained on the remaining 99.95% land area of the property. Therefore, the long-term sustainability of the resource is not unduly compromised. b) Tourism The proposed farm stay visitor accommodation will attract tourists to the region without unduly compromising the long-term sustainability of resource development use since the property retains its current agricultural land use in the remaining 99.95% land area of the property. Furthermore, this accommodation can be used to house family members or seasonal farm hands to help with farm operations during peak seasons and in the off seasons, serve as a tourist accommodation. c) Rural Communities The proposed farm stay visitor accommodation will facilitate attracting tourists to the region which, in turn, will be beneficial for the broader rural community as tourists take advantage of the many unique tourism attractions, places of interest and natural values such as highlands, cradle mountain, and the northern midlands. It is reasonable to expect that this type of farm stay visitor accommodation would have a positive economic impact on the wider region as visitors would stay longer, visit more attractions and places of interest. Additionally, the ongoing operation of the visitor accommodation would have a flow on economic benefits due to the need for cleaning services and various accommodation consumables.

6.1.3 Clause 26.1.3 Desired future character statements

Desired future character statements:	Response:
The visual impacts of use and development within the rural landscape are to be minimised such that the effect is not obtrusive.	The proposed visitor accommodation would have minimal impact on the rural landscape as there are no nearby neighbouring dwellings and the development site is sheltered by woodland vegetation, dam and topography. Therefore, proposed development would not be obtrusive.

6.2 Clause 26.3 Use standards

6.2.1 Clause 26.3.1 Discretionary uses if not a single dwelling

Objective:	Response
a) To provide for an appropriate mix of uses that support the Local Area Objectives and the location of discretionary uses in the rural resources zone does not unnecessarily compromise the consolidation of commercial and industrial uses to identified nodes of settlement or purpose built precincts. b) To protect the long-term productive capacity of prime agricultural land by minimising conversion of the land to non-agricultural uses or uses not dependent on the soil as a growth medium, unless an overriding benefit to the region can be demonstrated. c) To minimise the conversion of non-prime land to a non-primary industry use except where that land cannot be practically utilised for primary industry purposes. d) Uses are located such that they do not unreasonably confine or restrain the operation of primary industry uses. e) Uses are suitable within the context of the locality and do not create an unreasonable adverse impact on existing sensitive uses or local infrastructure.	a) The proposal is consistent with the local area objectives. The development is on Class 6 land at the property to be used as a farm stay style visitor accommodation and does not confine or constrain the current agricultural land use at the property. b) N/A. There is no prime agricultural land at the property. c) The proposed visitor accommodation is to be located on Class 6 land at the property that accounts for less than 0.05% of the total property area. The area is not utilised for cropping or grazing currently and the proposed development has sufficient setbacks with topographic and vegetative buffers. The proposed visitor accommodation does not diminish the productive capacity of the land and the property retains its agricultural land use in entirety. d) The proposed development is located on Class 6 land, next to the irrigation dam, that has no significant agricultural use and is only used while rotating sheep between paddocks. The intensively farmed areas of the property are located at least 465m (approximately) to the east and west. Thus, there is sufficient setbacks with topographic and vegetative buffers. Therefore, the proposed visitor accommodation does not unreasonably confine or restrain the operation of primary industry uses. e) There are no neighbouring dwellings within 1km of proposed development, apart from the manager's residence on subject property (Figure

f) The visual impacts of use are appropriately managed to integrate with the surrounding rural landscape.	11). The proposed development is adequately sited to minimise any conflict with surrounding land use. Therefore, the use is suitable within the context of the locality and does not create an unreasonable adverse impact on existing sensitive uses or local infrastructure. f) The proposed development will utilise modern design and sustainable building materials to integrate with the rural landscape. It is also suitably sited, sheltered by woodland vegetation and topography, so as to not be obtrusive.
Performance Criteria:	**Response**
P3 The conversion of non-prime agricultural to non-agricultural use must demonstrate that: a) the amount of land converted is minimised having regard to: (i) existing use and development on the land; and (ii) surrounding use and development; and (iii) topographical constraints.	**P3** The proposed farm stay visitor accommodation does not significantly alter the existing land use or interaction with surrounding land and thus, unlikely to cause constraint or interference. a) The proposed farm stay visitor accommodation is to be located on Class 6 land and accounts for less than 0.05% of the total property area. The area has abundant frequent rocky outcrops and is situated next to the irrigation dam. The site of proposed development is unsuitable for cropping with severe limitations to grazing The property retains its agricultural land use (i.e. cropping and grazing) on the remaining land area. The land area immediately surrounding the development site is also of low land capability, Class 5 land, only used while rotating sheep between paddocks and is not affected by the proposed visitor accommodation. The proposed setbacks are sufficient and buffers created by topography and woodland vegetation help to minimise any potential constrains and conflict with surrounding land use *(see section 4 and 5 of the agricultural assessment)*.

6.2.2 Clause 26.3.2 Dwellings

Objective:	**Response**
To ensure that dwellings are: a) incidental to resource development; or b) located on land with limited rural potential where they do not constrain surrounding agricultural operations.	The proposed development is located on low land capability, Class 6 land and the proposed setbacks along with topography and vegetative buffers are sufficient to prevent any conflict or constraint on surrounding agricultural operations.
Performance Criteria:	**Response**
P1.1 b) the site is practically incapable of supporting an agricultural use or being included with other land for agricultural or other primary industry use, having regard to: i) limitations created by any existing use and/or development surrounding the site; and ii) topographical features; and iii) poor capability of the land for primary industry operations (including a lack of capability or other impediments).	**P1.1** The site of the proposed visitor accommodation is to be located on low land capability, Class 6 land. The area has abundant frequent rocky outcrops and is situated next to the irrigation dam. The site of proposed development is unsuitable for cropping with severe limitations to grazing The property retains its agricultural land use (i.e. cropping and grazing) on the remaining land area. The land area immediately surrounding the development site is also of low land capability, Class 5 land, only used while rotating sheep between paddocks and is not affected by the proposed visitor accommodation. The proposed setbacks are sufficient and buffers created by topography and woodland vegetation help to minimise any potential constrains and conflict with surrounding land use *((see section 3 and 4 of the agricultural assessment*).
P1.2 A dwelling may be constructed where it is demonstrated that wastewater treatment for the proposed dwelling can be achieved within the lot boundaries, having regard to the rural operation of the property and provision of reasonable curtilage to the proposed dwelling.	**P1.2** An adequate onsite wastewater treatment system would be supplied.
P1.3 A dwelling may be constructed where it is demonstrated that the lot has frontage to a road or a Right of Carriageway registered over all relevant titles.	**P1.3** The property has frontage with Blackwood Creek Road. The dwelling will utilise the existing farm access roads and laneways via Right of Carriageway.

6.2.3 Clause 26.3.3 Irrigation districts

Objective:	**Response**
To ensure that land within irrigation districts proclaimed under Part 9 of the *Water Management Act 1999* is not converted to uses that will compromise the utilisation of water resources.	The proposed visitor accommodation is within the Whitemore Irrigation District and hence, Performance Criteria P1 is addressed.
Performance Criteria:	**Response**
P1 Non-agricultural uses within an irrigation district proclaimed under Part 9 of *the Water Management Act 1999* must demonstrate that the current and future irrigation potential of the land is not unreasonably reduced having regard to: a) the location and amount of land to be used; and b) the operational practicalities of irrigation systems as they relate to the land; and c) any management or conservation plans for the land.	**P1** The proposed development is for a farm stay visitor accommodation. The proposed dwelling area accounts for less than 0.05% of the total land area of the property and is located on Class 6 land. The remaining 99.95% of the land area retains its current agricultural land use of irrigated cropping and a combination of dryland and irrigated grazing. The land area immediately surrounding the development site is also of low land capability, Class 5 land, only used while rotating sheep between paddocks and is not affected by the proposed visitor accommodation. The property has undergone significant irrigation development, with approximately $1.5 million spent in the last two years. The property is in the Whitemore Irrigation District and consists of irrigation infrastructure such as irrigation mains, pivot irrigators, and a 1155ML dam (with another proposed 212.6ML dam). There is a 1485ML irrigation water allocation from the scheme Therefore, the proposed use will not unreasonably reduce and/or materially diminish the current and future irrigation potential of the land.

6.3 Clause 26.4 Development standards

6.3.1 Clause 26.4.1 Building location and appearance

Objective:	**Response**
To ensure that the: a) ability to conduct extractive industries and resource development will not be constrained by conflict with sensitive uses; and b) development of buildings is unobtrusive and complements the character of the landscape.	The proposal is consistent with Acceptable Solutions A1 but not A2, hence, Performance Criteria P2 is addressed.
Acceptable Solutions:	**Response**
A1 Building height must not exceed: a) 8m for dwellings; or b) 12m for other purposes.	**A1** The building height will be less than 8m.
Performance Criteria:	**Response**
P2 Buildings must be setback so that the use is not likely to constrain adjoining primary industry operations having regard to: a) the topography of the land; and b) buffers created by natural or other features; and c) the location of development on adjoining lots; and d) the nature of existing and potential adjoining uses.	**P2** The proposed visitor accommodation has greater than 200m setback to all title boundaries except to the south, which is approximately 80m. However: a) The topography of the area surrounding the proposed development aids the setback so as to not confine or conflict with agricultural land use. The proposed location for the development is on a small hill, next to the dam, on Class 6 land and sits at a higher elevation. The development does not diminish the productive capacity of the land nor does it constrain surrounding land use (*see section 4 of the Agricultural Assessment*). b) There are buffers created by landform and topography, in addition to natural woodland vegetations to the east and west and irrigation dam to the north. c) There is no development on adjoining title to the south (*see figure 11 and 12*). d) The land area immediately surrounding the development site is also of low land capability, Class 5 land, only used while rotating sheep between paddocks and is not affected by the

e) the ability to accommodate a lesser setback to the road having regard to: i) the design of the development and landscaping; and ii) the potential for future upgrading of the road; and iii) potential traffic safety hazards; and iv) appropriate noise attenuation.	proposed visitor accommodation. Land use on adjoining title to the south is dryland grazing. The nature of use is not expected to change or intensified in the future, both on the subject and adjoining property. Furthermore, the setbacks aided by topography and vegetative buffers are sufficient to prevent any unduly conflict or constraint on surrounding land use. e) Not applicable as the development is not adjacent to any public road and sheltered by surrounding woodland vegetation and topography. Access to proposed visitor accommodation will be via the existing farm roads inside the property.

7 Conclusion

1. The property does not contain any prime agricultural land.
2. The proposed development is on Class 6 land, which is unsuitable for cropping with severe limitations to pastoral use.
3. Land immediately surrounding proposed development is Class 5 land that is unsuitable for cropping with moderate limitations to pastoral use.
4. The proposed development does not significantly alter the existing interaction of the property with surrounding land and within the property itself.
5. The proposed farm stay visitor accommodation does not affect the productive capacity of the land.
6. Current and future irrigation and agricultural development at the property will not be affected by the proposed visitor accommodation.
7. The proposed visitor accommodation would not create any additional constraints on the capability/capacity of agricultural activities on the property or neighbouring land.
8. The proposal is consistent with the Northern Midlands Interim Planning Scheme Rural Resource zone purpose, local area objectives, use standards, acceptable solutions and performance criteria statements 26.1.1, 26.1.2, 26.1.3, 26.3.1 P3(a), 26.3.2 P1.1(a) P1.2 P1.3, 26.3.3 P1 and 26.4.1 A1 P2.

8 References

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Isbell R.F., National Committee on Soil and Terrain (2021), 'The Australian Soil Classification. 3rd edn. CSIRO Publishing Melbourne.

National Committee on Soil and Terrain (2009) 'Australian soil and land survey field handbook (3rd edn).' (CSIRO Publishing: Melbourne).

9 Declaration

I declare that I have made all the enquiries which I consider desirable or appropriate, and no matters of significance which I regard as relevant have, to my knowledge, been withheld.

Faruq Isu

Mr. Faruq Isu MAppSc (AgrSc)
Consultant
Pinion Advisory Pty Ltd
May 2022

Appendix B

Example Plants

Taz Wild Plants

Phone: (03) 6384 2165
Fax: (03) 6384 2165
Web site: www.tazwild.com

Wastewater Treatment Units

Tasmanian Plants suitable for Water from Wastewater Treatment Units

Water from septic tanks and aerated wastewater treatment units such as Biocycle, Envirocycle or other may contain salts, boron and disease bearing microbes. The major ingredients of most cleaning fluids are various salts, of which common kitchen salt (sodium chloride) is the least common. These salts may have large concentrations in wastewater, which can have a detrimental effect on plants. The survival of plants will depend on the concentrations of salts. Long-term build up of chemicals and salts in the soil will adversely affect any plantings.

We can't guarantee these plants will survive but they are tolerant to reasonable amounts of the main offenders and will tolerate wet conditions.

Below is a list of plants to help make an attractive garden bed for your wastewater treatment area.

PLANTS 1 – 6m

Acacia mucronata
Variable sallow wattle, Narrow leaf wattle
An upright or spreading, medium to tall shrub 3-4m X 2-3m. Quick growing. Profuse cream to yellow flowers in spring, showy. Attracts seed eating birds. Drought tolerant.

Acacia verticillata
Prickly Moses
Prickly shrub to 2m. Useful habitat plant and very attractive in flower.

Banksia marginata
Honeysuckle, Silver banksia
Evergreen shrub or small tree with attractive narrow, smooth edged leaves which are square or notched at the end and silvery beneath. Greenish yellow cones of flowers that last as cut flowers. Grows well in sandy soil. Strong upright growth.

Bauera rubioides
Dog Rose
Hardy small to medium dense shrub. 1-2m X 1-2m wide with masses of dainty pink flowers, flowering most of year, attracting butterflies. Grows well in wet or moist soils, prefers acid soils. Likes full or filtered sun. Good coastal pant. Frost tolerant. Prune regularly. Good erosion control.

Callistemon pallidus
Lemon Bottlebrush
Evergreen medium shrub, very upright with silky leaves that become smooth with age. Lovely lemon yellow bottlebrushes in spring and summer. Likes a dry or moist position. Tolerates full or filtered sunlight. Attracts nectar eating birds.

Callitris oblonga
Cypress pine, South esk pine
This is one of Australia's native conifers. It has an attractive shrubby shape and is suitable for use in the garden as a fast growing hedge, since it can be pruned to shape. It is also useful for gardens where the soil is rocky and sandy but will tolerate a range of soils, providing the drainage is good.

Correa backhousiana
Velvet correa
A dense, bushy, spreading shrub to 1.5m high by 2m wide. Leaves are glossy green on top, rusty coloured underneath. Greenish cream bell flowers in winter. Spring bird attracting. Tolerates lime and coastal plantings. Usually frost resistant.

Leptospermum lanigerum
Woolley tea-tree
Hardy medium to large shrub 2.5 to 5m high x 1.2-3m wide, massed with white flowers during spring. Soft grey foliage. Prefers moist to wet soils with good drainage and will grow well in full or filtered sun. Attracts butterflies and seed eating birds. Tolerates light snow, smog and frost.

Melaleuca ericifolia
A very hard, fast growing small evergreen tree suited to most soils and aspects. Suitable for poorly drained or saline soils and withstands coastal exposure. Needle-like leaves and 2-3cm long cream flower spikes, in spring and early summer. Ideal for planting as a screen.

Melaleuca gibbosa
Fine leafed paperbark, Slender honey-myrtle
Evergreen small shrub with mauve/purple ball shaped flowers in late spring and summer. Suitable for most soils, tolerating lime and salt soil. Frost resistant.

Melaleuca squarrosa
Tall, bushy shrub, good foliage. Scented, yellow brush flowers, in spring-summer. Suitable for most soils, tolerating very wet conditions, lime, saline and frost.

Micrantheum hexandrum
River box
Attractive foliage plant with new growth showing red stems. Cream flowers in spring. Grows up to 2m high. Prune to form a dense screen plant.

Notelaea ligustrina
Native Olive, Mock olive, Privet mock olive
Tall shrub with smooth, dark green leaves. Small yellow flowers and purple fruit. Prefers a moist, semi-shaded position but grows well in a wide range of conditions.

Pomaderris apetala
Dogwood
Medium to tall shrub 3 to 15 m. This shrub grows in a wide variety of sites from very dry to very wet but will grow larger with moisture. Looks good planted in copses.

SHRUBS TO 1m

Amperea xiphoclada
Upright or arching stems. Attractive foliage sculpturesque in appearance to 60cm. Useful for basket weaving. Dry to moist sites.

Blechnum penna-marina
Alpine Water Fern
Attractive, low growing, matted ground cover. Leathery dark green fronds to 15cm long, tinged pink when young. Ideal hanging baskets. Rockeries and moist positions in the open ground.

Blechnum wattsii
Hard Water Fern
Hardy and vigorous fern with dark green leathery fronds to 1m tall. Very easily grown in large pot or a moist, shady position in the ground.

Callistemon viridiflorus
Green Bottlebrush
Erect shrub with pale green bottlebrushes. Good in damp conditions. 1-2m X 1m. Frost resistant.

Carex appressa
Tall sedge, Tussock sedge
A tall perennial to 1.8m high. Stems acutely 3 angled and leaves 3-6mm broard. Occurs in winter wet depressions that can dry out completely in summer. Flowers in spring.

Carex inyx
Tassell Sedge
Evergreen clump forming sedge with green foliage and gorgeous golden brown pendulous tassels 1m x 1m.

Carex tasmanica
Curley Sedge
An upright sedge to 30cm. Attractive tight curls on tips of leaves. Wet sites but will tolerate long dry spells.

Dianella tasmanica
Flax Lily
An evergreen perennial plant with arching, strap-like leaves which can be up to 1.2m long. During spring and summer this plant bears clusters of nodding, star shaped, bright blue to purple flowers which are followed by glossy deep blue berries. Thrives in a sunny to partly shaded position in humus rich, well drained soil. Ideal for rockeries, poolside planting and containers.

Ficinea nodosa (syn isolepis nodosa)
Knobby club rush
Dense tufted native rush with stiff stems. Rounded brown flower knobs in summer. Suit damp or moist sandy soil. 60cm X 1m wide.

Ficinea nodosa (syn isolepis nodosa)
Knobby club rush (syn. Isolepis nododa)
Ideal for planting around pond margins, this fast growing perennial plant forms clumps of upright, often arching, dark green stems. Brownish, globular flower heads are produced throughout the year. A tough hardy plant which thrives in full sun in a range of soils. Tolerates salt spray, waterlogged and saline soils. Adds texture and colour to seaside gardens and water features, useful for general garden planting.

Goodenia elongata
Lanky Goodenia
Suckering ground cover 10cm tall X 50cm. Glossy green leaves, rich yellow flowers on tall stems spring-summer, prefers moist soils in full sun or part shade.

Isolepis inundata
Knobby club rush, Swamp club rush
Handy aquatic for waters edge or general planting (eg. shrub beds, dry creek beds).

Lomandra longifolia
Long leaf mat bush, Sagg
A popular plant for use as accent in gardens, where the rush like foliage contrasts well with broad leafed plants. Use it next to ponds or as a boarder plant. Flowers in spring, bearing clusters of cream, strongly perfumed flowers - great for use in flora arrangements. A very adaptable plant that will grow well in a range of soils but does best in a moist position.

Mazus pumilio
Mauve carpet
Low growing creeping plant. Ideal ground cover, with mauve flowers, spring and summer. Semi shade or sun.

Melaleuca squamea
A bushy shrub to 1m with stunning mauve flowers in spring-summer. Grows well in a damp spot. Frost hardy.

Poa labillardieri
A popular native grass grown for its soft blue foliage. In the warmer months this clumping plant produces an attractive flower head with a purple tint. Thrives in a sunny to partly shaded position and grows in a range of soils. Suitable for planting under trees, embankments and mass plantings. Cut to just above ground level in late winter for fresh new spring growth.

Polystichum proliferum
Mother Shield Fern
An easy to grow fern with attractive green fronds. New fronds are covered with eye catching brownish scales. An ideal plant for ferneries and shaded garden positions but will perform equally well when planted in a container. Plant in humus rich, moist, well drained soil in part shade. Fertilise with a good organic fertilizer. When planting in containers use a premium potting mix.

Polystichum proliferum
Mother Shield Fern
Attractive native fern with arching fronds to 1m long forming plantlets near the tip. Very easily grown in a moist position in morning or filtered sun. Suitable for tubs.

Pratia pedunculata
Blue pratia, Common pratia, White pratia
This dainty, spreading plant forms a carpet of tiny green leaves which from spring to early summer is smothered in a mass of tiny, white flowers. This carpeting plant is ideal for filling in spaces near rocks and sleepers and makes an attractive groundcover. Thrives in a sunny to semi-shaded position in moist soil. Keep moist at all times.

Pratia pedunculata
Blue pratia, Common pratia, White pratia
This dainty, spreading plant forms a carpet of tiny, green leaves, which from spring to early summer is smothered in a mass of tiny blue flowers. This carpeting plant is ideal for filling in spaces near rocks and sleepers, and makes an attractive groundcover, thrives in a sunny to semi-shaded position in moist soil. Keep moist at all times.

Scaevola hookeri
Creeping fan flower, Mat fan flower
A very densely matting, evergreen groundcover with glossy, dark green leaves and small, white fan-shaped flowers in flushes, during spring, summer and autumn. An excellent soil binding plant for average to moist positions. Frost hardy.

Velleia paradoxa
Spur valleia
Wild flower 20cm X 20cm with large yellow flowers spring and summer. Prefers moist soils which are well drained and part shade to full sun.

Viola fuscoviolacea
A spreading, matting violet with attractive dense foliage and tiny deep purple-blue flowers in spring and summer. Prefers a moist position. Withstands frosts and snow.

Viola hederacea
Native violet
An attractive creeping evergreen perennial with fan shaped leaves. This plant produces beautiful mauve flowers over a long flowering period. An ideal ground cover for full sun to part shade in well drained soils.

TREES

Acacia dealbata
Silver Wattle
A tall tree with a smooth trunk, often decorated with silvery, mottled patches contrasting with the greyish-green leaves. In spring, clusters of golden-yellow, fluffy ball like flowers almost cover the whole tree.

Acacia melanoxylon
Blackwood
A beautiful formal tree that produces one of Australia's most sought after woods for cabinet making. Light yellow flowers occur in winter and early spring. A useful tree for a windbreak or screen as it grows densely. It is also tolerant of a wine range of positions, however its height and width will be greatest if the soil is moist and fertile.

Eucalyptus ovata
Black gum, Swamp gum
Evergreen medium to tall moisture loving tree, good for poorly drained soils. Smooth white trunk. Masses of white flowers in autumn which attract birds. Frost hardy. Good tree for cool districts. Water absorber. Drought tolerant. Excellent shade and windbreak tree.

Eucalyptus rodwayi
Swamp Peppermint
This tree is suitable for a wide range of conditions, from very dry sandy soils to river banks. Grows 15 to 20m.

Eucalyptus viminalis
White Gum
A magnificent tree with a lovely white trunk. This tree is suitable for very dry to very wet sites. Its height is 20 to 40m depending on availability of moisture.

Pomaderris apetala
Dogwood
Medium to tall shrub 3 to 15 m. This shrub grows in a wide variety of sites from very dry to very wet but will grow larger with moisture. Looks good planted in copses.

Prostanthera lasianthos
Christmas bush, Tasmanian Christmas bush
The Tasmanian Christmas bush comes into flower around Christmas with masses of mint scented foliage. A rapid growth in a range of soils but for best results grow in a well drained soil and mulch to retain moisture in the drier months. An attractive plant that will grow in a range of positions in the garden.

Tasmannia lanceolata
Mountain pepper, Native pepper
Small leafed mountain form. Handsome foliage shrub with bright green leaves and red stems. Creamy-yellow flowers in spring. Slow growing to 1.5m, hardy in a cool moist well drained position in sun or shade.

Appendix C

Certifications

D1 Consulting Engineers

LOADING CERTIFICATE

To:	**Scott Colvin**		*Owner/Agent*	Certificate Ref: AS/NZS 1547:2012 Section 7.4.2
	157 Blackwood Creek Road		*Address*	
	Blackwood Creek	**7301**	*Suburb/postcode*	

Details of Works:

Address:	**157 Blackwood Creek Road**		*Project No.*	**35723**
	Blackwood Creek	**7301**		
The work related to this certificate:	On-site domestic wastewater management		(Description of the work or part work being certified)	

Certificate details:

In issuing this certificate the following matters are relevant -

Documents:	Report 35723 D1CE dated 29/05/2023 Figure 1 – Site Plan Figure 2 – AWTS Sub-Surface drip irrigation system
Relevant Calculations:	Contained in the above
References:	AS/NZS 1547-2012 On-site domestic wastewater management

Substance of Certificate:

This certificate sets out the design criteria and the limitations associated with use of the system.

Wastewater Characteristics

Population equivalent used for this assessment	= 5 (3 bedrooms)
Wastewater volume (L/day) used for this assessment	= 600 (120 Litres per person)
Approximate black water volume (L/day)	= 240
Approximate grey water volume (L/day)	= 360

Soil Characteristics/ Design Criteria	
Texture (Table E4 from AS1547:2012)	= Sandy Loam
Soil Category (Table E1 from AS1547:2012)	= 2
Soil Structure (Table E4 from AS1547:2012)	= Weakly
Indicative permeability (Table 5.1 AS1547:2012)	= >3.0m/day
Measured permeability	= >3.0m /day
Adopted permeability	= >3.0m /day
Adopted Design Loading Rate	= 5mm/day
Soil Thickness for disposal	= >0.7m
Minimum depth (m) to water	= >0.7m
Dimensions for On-site Treatment System	
Disposal and treatment methods	= Aerated Wastewater Treatment System (AWTS) and sub-surface irrigation
Site modifications and specified design	= N/A
Water saving features fitted:	= Water Saving Fixtures
Primary disposal area required	= 120m^2
Reserve disposal area required	= 120m^2
Location and use of Reserve area	= Refer to site plan
Is there sufficient area available on site for disposal (including reserve)	= Yes

Notes

The purposed of the reserve area is to allow for future extension of the land application system to allow a factor of safety against unforeseen malfunction or failure, perhaps following increased household occupancy or inadvertent misuse of the system. The land application area may be reduced to account for flow reductions by water-saving devices, provided the organic loading rate is not higher that it would have been without the flow reduction. As no reserve area is available a 20 year life cycle has been applied to this system for testing.

Allowable Variation from Design Flow

Based on an approved AWTS 10 EP system (10 equivalent persons) rated at 1500 litres per day and a wastewater design volume of 600L/day the allowable variation from design flow (peak loading events) would be an additional 450L/day.

System Limitations

Consequences of overloading the system:

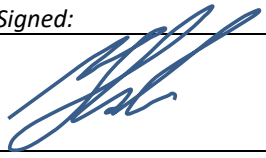
A. Adverse effects on soil properties and plant growth through excess salt accumulation in the root zone during extended dry periods
B. Harmful long-term environmental effects to the soil of land application system or the adjacent surface water and groundwater; or
C. Increased risk to public health from surface ponding in the land application area or channeling or seepage beyond the land application area.

Consequences of under-loading the system:
Not applicable to this type of system.

Operation Requirements
Refer to operation manual of preferred aerated wastewater treatment system.

Maintenance Requirements
Refer to operation manual of preferred aerated wastewater treatment system.

I certify the matters described in this certificate.

Certifier:	*Signed:*	*Date:*	*Certificate No.*
		29/05/2023	20023

Marcus Salonen
MIEAust CPEng NER (Civil/Structural)
RPEQ 20174
CC7347

WOOLCOTT SURVEYS

EAST COAST SURVEYING

Date 05/07/2023

The General Manager
Northern Midlands Council

By email: planning@nmc.tas.gov.au

RE: PLN-23-0099: NEW DWELLING FOR VISITOR ACCOMMODATION, 157 BLACKWOOD CREEK ROAD, BLACKWOOD CREEK.

Dear Sir/Madam

I am writing in relation to the above mentioned development application, currently on public exhibition until 14 July 2023. This submission is on behalf of John and Nancy Bell, who own the adjoining property at 1363 Blackwood Creek Road, Blackwood Creek.

The proposed visitor accommodation development is shown approximately 80m from our clients north western property boundary.

Of particular concern with this application is the proposed private access for the visitor accommodation. Plans from Cumulous Studio show that the accommodation will be accessed via an existing private access road, an indicative location of this track is shown in figure 1 below:

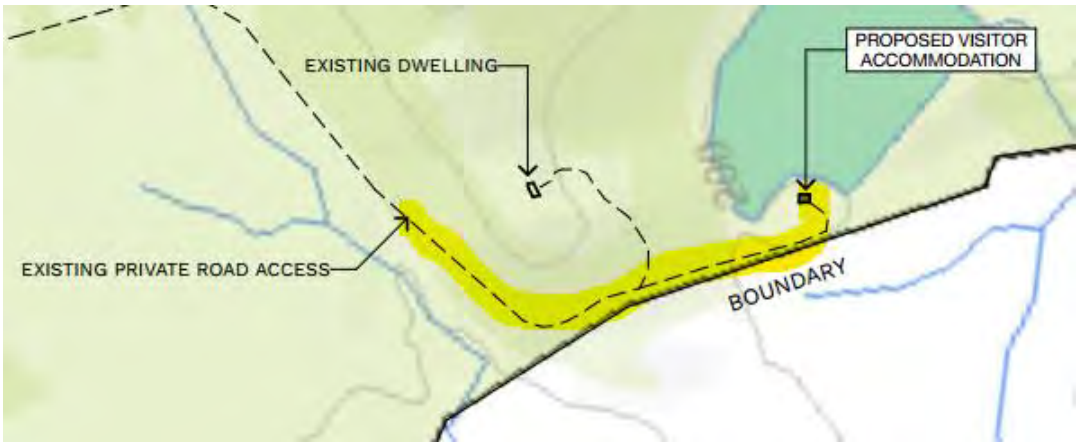


Figure 1 - Extract from Cumulous Plans, which show the "Existing private access road". Highlighting has been added.

The existing access track is shown as being adjacent the eastern title boundary. In a similar vein, the Bushfire Hazard Management Plan by Rebecca Green and Associates provides a general indication that the track is just inside the eastern boundary.

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DEVONPORT
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ABN 63 159 760 479

The reality is that the existing private access road encroaches significantly onto our client's land on CT52054/4. While this appears evident via aerial imagery, this has been confirmed via survey of the property boundaries in this part of the site. The below aerial image highlights the area of concern:

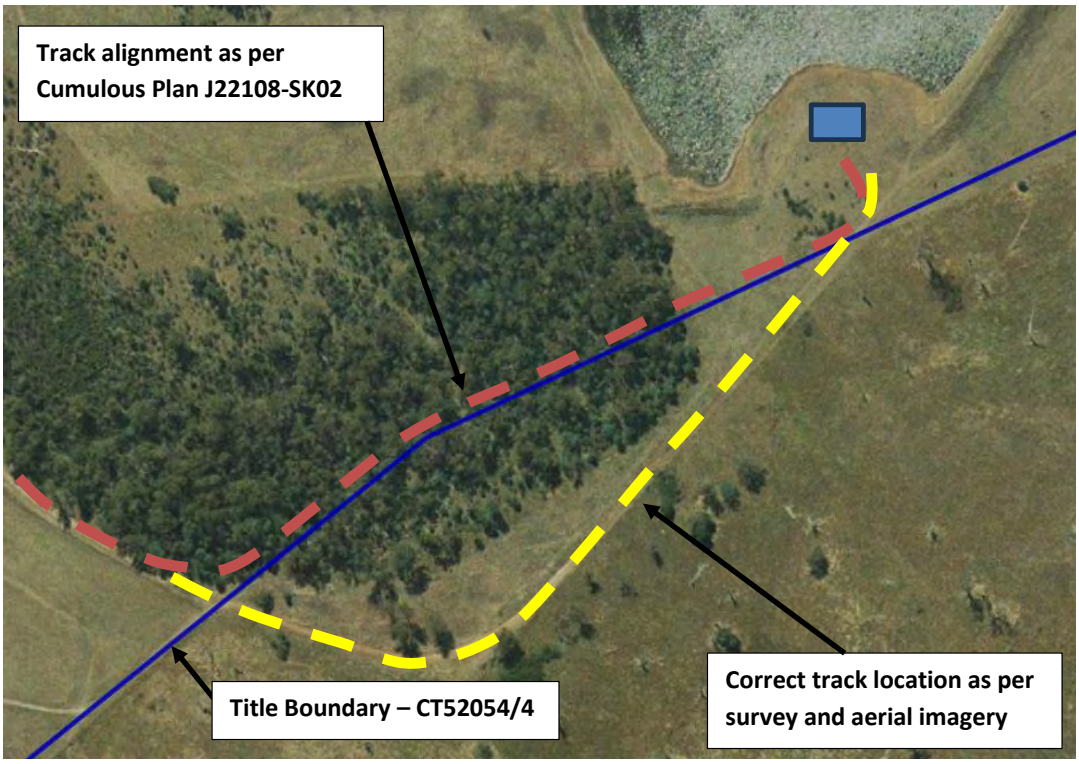

Figure 2 - aerial image of subject site showing access arrangements.

There is no Right of Carriageway or easement on CT52054/4, which would provide legal right to access the proposed visitor accommodation development over this land.

A marked up extract from the survey is shown in figure 3, which confirms the gravel track is generally where the blue line is:

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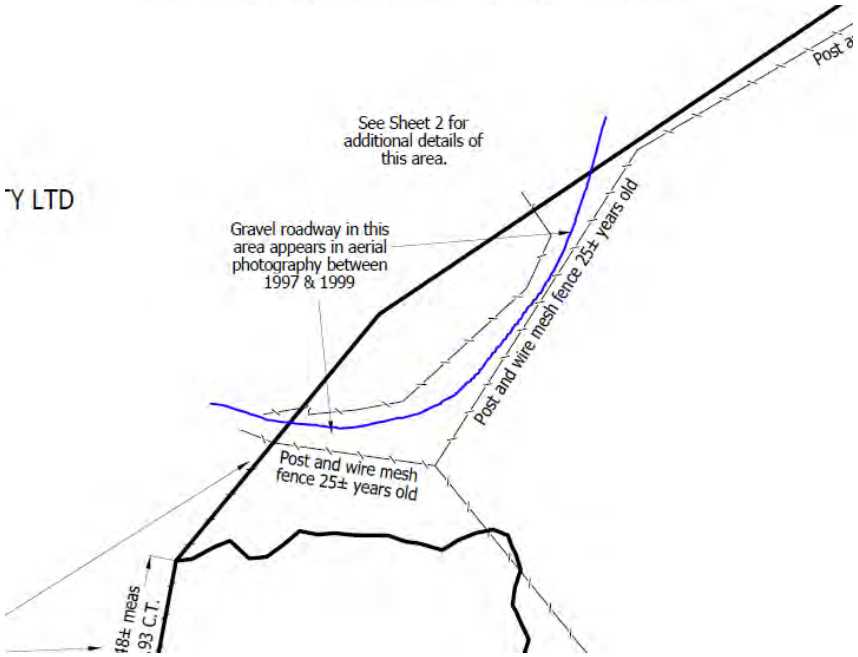

Figure 3 - Site plan based on survey, showing indicative track location in blue.

It is understood a copy of the survey/site plan has been provided to both our client, John and Nancy Bell, and the owners of 157 Blackwood Creek Road, Blackwood Creek, being Nosswick Pty Ltd.

The application form does not include the title details or address for the land at 1363 Blackwood Creek Road, nor have title documents been included for this property. On this basis, the applicant has declared that there is no use and/or development occurring on CT52054/4.

If use will be occurring via the existing access track, then the application should be declared invalid and updated to reflect this. Notwithstanding this point, our clients will not be agreeing for their land to be included as part of a planning application until any formal agreement has been reached between the two properties. If the track does in fact proposed to be realigned to within their own title boundary, then this would constitute a valid application.

With this in mind, should a permit be issued, a condition should be included that requires the access track to be entirely contained within CT109824/1. This track must be in place prior to the development commencing, which will ensure that any contractors or workers will not be utilising the existing access over CT52054/4.

General Comments:
Council must also consider proximity of the proposed accommodation and the setback from CT52054/4. Our clients currently run a working farm, with plans to undertake extensive irrigation via pivots across their land. They have recently established a new dam on McRaes Hill to the south east.

The Pinion Agricultural report has not made any recommendations regarding buffering or vegetation screening which can often be utilised where there is the potential for land use conflict.

The Pinion report states that there are buffers created by landform and topography, however this part of the site where the reduced setback is occurring is level, sitting at approximately the 200m AHD contour. In my view there are limited topographical features which would provide a benefit or added protection from land use conflict. There are no current vegetation buffers occurring along or within proximity to the southern boundary.

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The report makes no reference to the existing dam on McRae's Hill to the south, and what the impacts of having a dwelling downstream of the existing dam are. It is unclear whether the application for a dwelling been discussed with Department of Natural Resources, and Environment Tasmania (NRE) to ensure compliance with Dam safety and separation requirements for dwellings.

A draft irrigation design for our client's land shows a future pivot irrigation being 170m from the proposed dwelling. Impacts on this dwelling can include irrigation overspray and chemical spraying.

Crop protection and vermin control is a common occurrence on farms; however, it is noted a person must not discharge a firearm within 250m of a dwelling. How this dwelling may constrain and impact our client's ability to manage vermin and pests on his own property is concerning. The farm operates 24 hours a day and 7 days a week, resulting in emissions that would typically be expected from a working farm.

Visitors to the proposed accommodation may expect a certain level of amenity be provided, however the reality is that noise, odours, and other farming related activities will occur. The primary zone purpose of the Agriculture Zone is to provide for use and development of land for agricultural use.

Our clients are not opposed to the visitor accommodation development, however are concerned by the access road location and the offset from the boundary. It would be appreciated if the applicant may be able to consider an alternative location for the accommodation that would comply with the 200m acceptable solution setback for sensitive uses.

If you have any questions regarding the contents of this letter, please don't hesitate to contact me on the numbers provided.

We are also happy to discuss with the applicant.

Kind regards

James Stewart
Senior Town Planner

Annexure 1 – Site Plan based on survey – Woolcott Surveys
Annexure 2 – McRae's Hill Irrigation Development Plan - Pinion Advisory.

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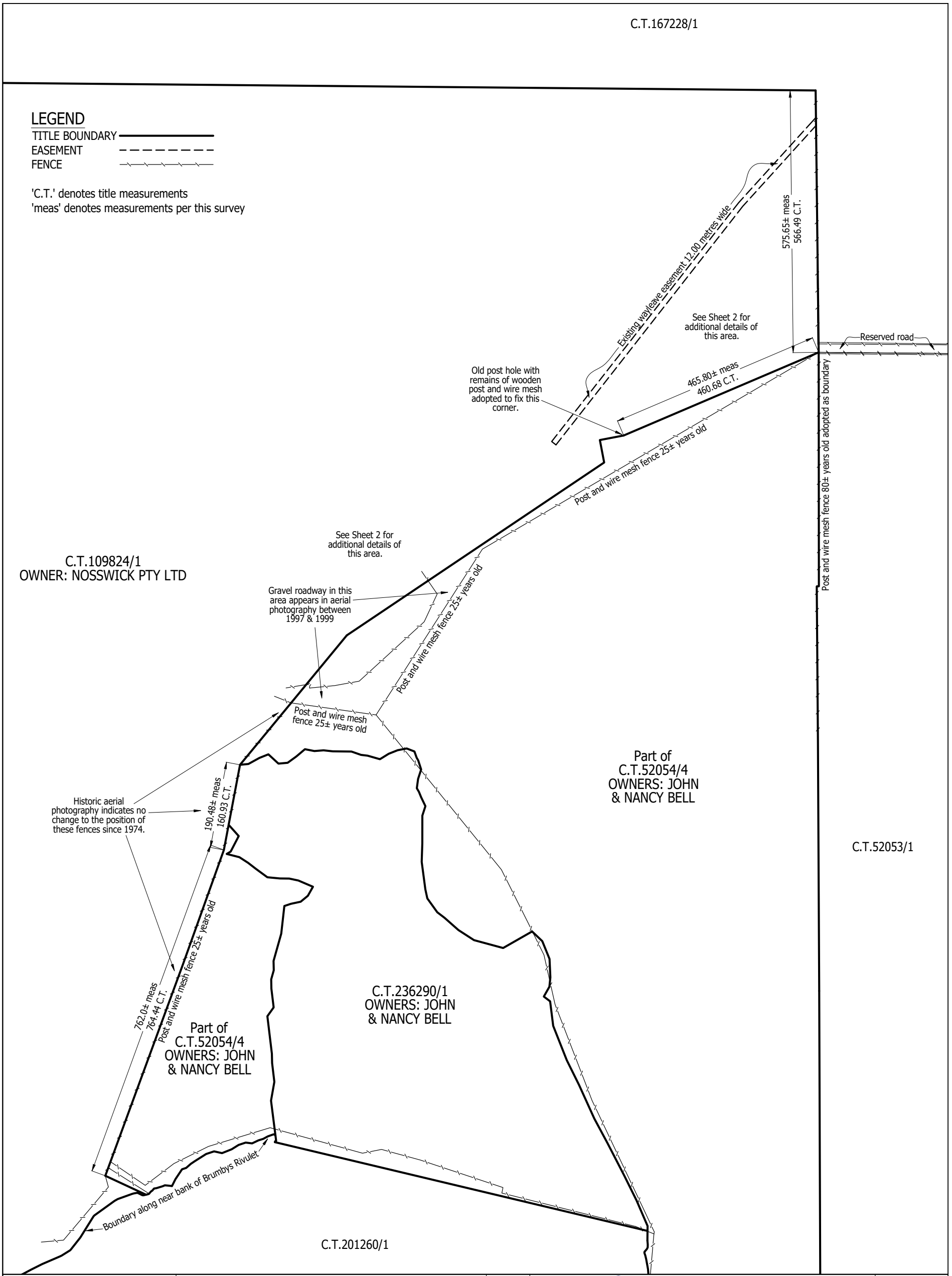

Notes:
1. All measurements and areas are subject to survey.

SITE PLAN
OWNERS: JOHN & NANCY BELL; NOSSWICK PTY LTD
1363 & 157 BLACKWOOD CREEK ROAD, BLACKWOOD CREEK
C.T.52054/4, C.T.236290/1 & C.T.109824/1

N

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Phone (03) 6332 3760
Fax (03) 6332 3764
Email: admin@woolcottsurveys.com.au

Job Number L220704

Drawn	File name	Date	Scale	Edition	Sheet
ABB	L220704_Site_Plan_280223.dwg	15/03/23	1:7500@A3	v2.0	1/2

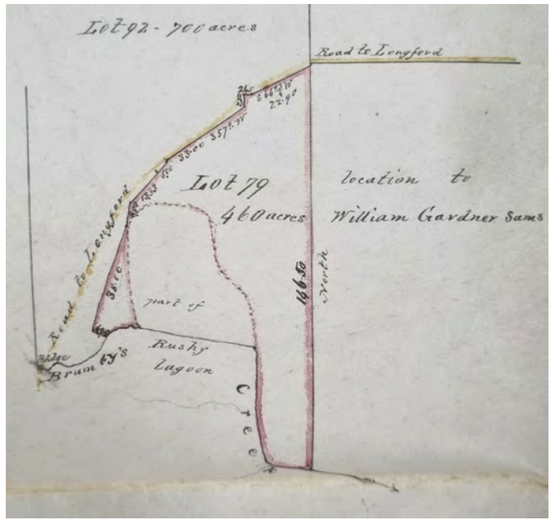
LEGEND

TITLE BOUNDARY
EASEMENT
FENCE

'C.T.' denotes title measurements
'meas' denotes measurements per this survey
'calc' denotes calculated measurements

The boundary between what is now C.T.52054/4 & C.T.109824/1 was originally defined by written description in historic deed 04/7043 dated 24th January, 1859. The written description states that the boundary was fenced at that date, and also refers to a diagram (shown right ->). This diagram is not to scale but does provide a general idea of the intended boundary geometry and the relationships between the boundaries, the lagoon, and the old road formation.

Historic aerial photographs can be obtained dating back to 1974.



C.T.109824/1
OWNER:
NOSSWICK PTY LTD

These sections of boundary do not appear to have been fenced for many decades. Historic aerial photographs from 1974 and later do not appear to show any fencing. However, images from the 1970s and 1980s show a corridor with no large trees. This corresponds with the original location of the old road betwen Cressy and Blackwood Creek which ran parallel to these boundaries (see diagram above). Today, many smaller trees have grown up through this corridor, but there are no very large, old trees. Additionally, the calculated boundary alignment agrees closely with the concave edge of the old road formation which can be found relatively undisturbed in the bush.

Bearing of fence to south-west extended - total length of bountary per written deed description adopted.

681.34± calc
663.85 C.T.

186.3± meas

Post and wire mesh fence 10± years old

Post and wire mesh fence 25± years old
432.8± meas

Post and wire mesh fence 25± years old
188.6± meas

Post and wire mesh fence 25± years old
176.39 meas
368.74 total C.T.

Historic aerial photography indicates no change to the position of these fences since 1974.

A fence is visible in historic aerial photographs prior to 1996 in roughly this area but followed a more curved path. The purpose of this fence is unknown, but it may have been intended to separate the rougher bushland from the flatter paddocks.

C.T.236290/1
OWNERS: JOHN
& NANCY BELL

8.8±

Old fence visible in historic aerial photography from 1974-1990.

These two lines have been fixed mathematically using original measurements from the written deed descriptions.

50.29 C.T.

53.31 C.T.

Old post hole with remains of wooden post and wire mesh adopted as the title corner.

Old fence and hawthorn hedge visible in historic aerial photography from 1974-2001. While no fence exists today, the stony remains of the old road formation and occasional scattered posts confirm this boundary alignment.

465.80± meas
460.68 C.T.

Round concrete post at the intersection of fences adopted as the title corner.

This fence first appears in historic aerial photography around 1996

Post and wire mesh fence 25± years old
856.3± meas

C.T.167228/1

Reserved road

Post and wire mesh fence 80± years old adopted as boundary

C.T.52053/1

Part of
C.T.52054/4
OWNERS: JOHN
& NANCY BELL

Notes:
1. All measurements and areas are subject to survey.

SITE PLAN

OWNERS: JOHN & NANCY BELL; NOSSWICK PTY LTD
1363 & 157 BLACKWOOD CREEK ROAD, BLACKWOOD CREEK
C.T.52054/4, C.T.236290/1 & C.T.109824/1

N

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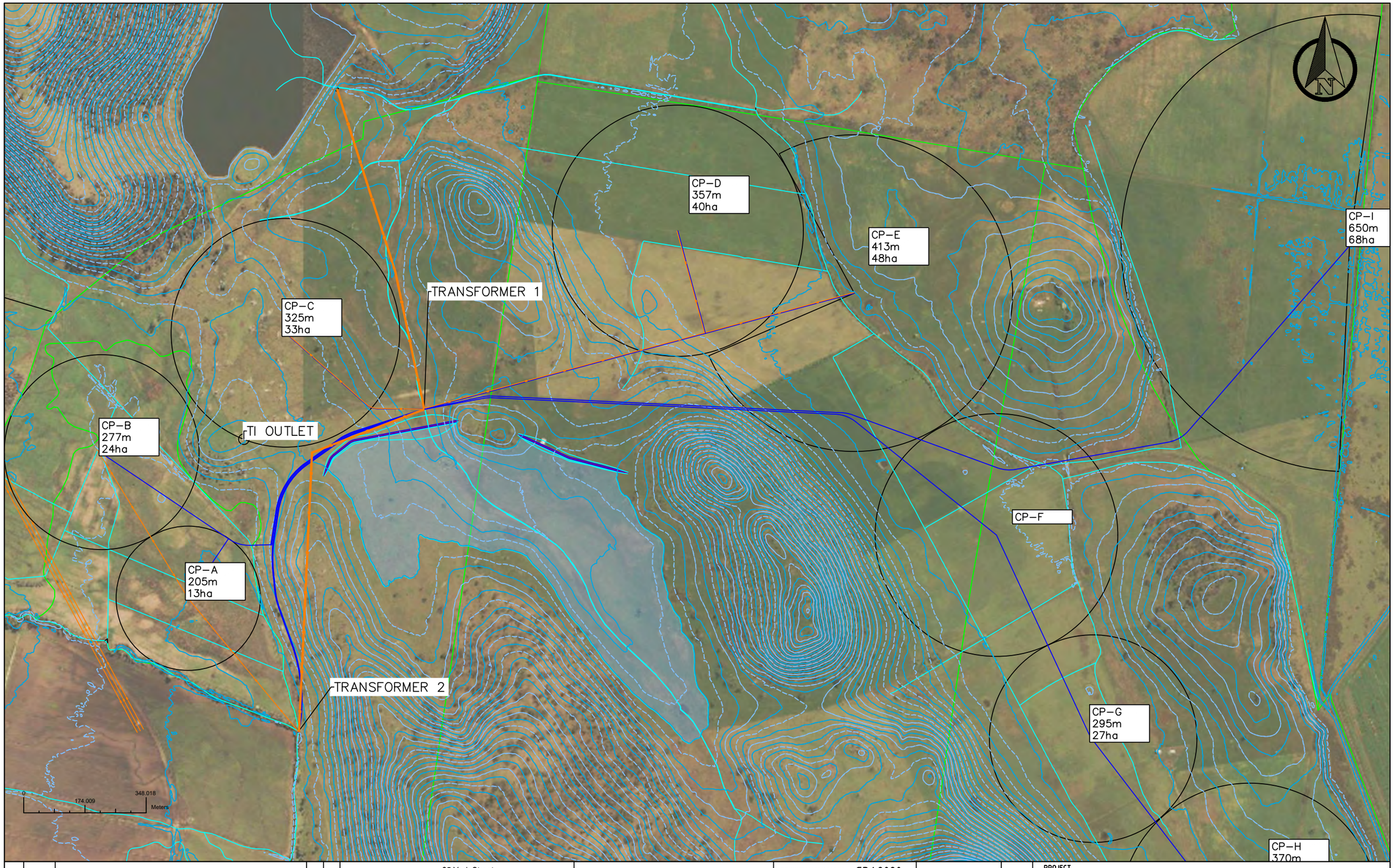

REV	DATE	COMMENTS	DRN	CHK
		5m CONTOUR INTERVAL		
A	5.6.23	FOR INFORMATION	DKM	DKM

25 York Street
Launceston
TAS 7250
Ph: 1300 PINION
Email: admin@pinionadvisory.com
www.pinionadvisory.com.au

COORDINATE DATUM: GDA2020
GRID ZONE: 55

PRELIMINARY

		DATE
DESIGNED:	DKM	5.6.23
DRAWN:	DKM	5.6.23
CHECKED:	DKM	29.9.22
APPROVED:	DKM	8.6.23

PROJECT: McRAES HILL - IRRIGATION DEVELOPMENT 2022
DRAWING TITLE: PIVOT LAYOUTS - CONCEPT
SCALE (A3): 1:10000
DRAWING NUMBER: IRRIGATIONDESIGN2023_B - 001
REVISION: A

RMCG

#2199

27 October 2023

Paul Godier
Senior Planner
Northern Midlands Council

Dear Paul,

Agricultural review of application for the establishment of visitor accommodation at 157 Blackwood Creek Rd and whether it complies with clauses 21.3.1.P2 & 21.4.2.P2

We are writing in response to your request to provide a desktop review of whether a proposal to construct a visitor accommodation building at 'Nosswick', 157 Blackwood Creek Rd, is compliant with clauses 21.3.1.P2 and 21.4.2.P2 of the *Tasmanian Planning Scheme – Northern Midlands* (the Planning Scheme).

Specifically, you have also asked us to consider the 'Agricultural Assessment and Compliance Report' and the issues raised in the 'General Comments' section.

The proposal seeks to construct a building for visitor accommodation that will serve two purposes:

1. To provide lodging to family members or seasonal farm labours to assist with farming activities during peak times such as sowing and harvesting.
2. During off peak time, the accommodation will be available for general visitors to stay on the farm. This will provide an additional source of income for the farming operation.

We have reviewed the information provided in the *Agricultural Assessment and Compliance Report*, by Pinion dated 7 May 2022, as well as undertaken our own desktop investigations.

The subject title and all surrounding land is zoned 'Agriculture' under the Planning Scheme.

The relevant sections of the Planning Scheme are:

21.0 Agriculture Zone

21.3.1 Discretionary uses

Objective: That uses listed as Discretionary:

a) Support agricultural use; and
b) Protect land for agricultural use by minimising the conversion of land to non-agricultural use

Performance Criteria

P2 – A use listed as Discretionary, excluding Residential, must minimise the conversion of agricultural land to non-agricultural use, having regard to:

a) The area of land being converted to non-agricultural use;

b) Whether the use precludes the land from being returned to an agricultural use;

c) Whether the use confines or restrains existing or potential agricultural use on the site or adjoining sites.

21.4.2 Setbacks

Performance Criteria

P2 Buildings for a sensitive use must be sited so as not to conflict with an agricultural use, having regard to:

a) The size, shape and topography of the site;

b) The prevailing setbacks of any existing buildings for sensitive uses on adjoining properties;

c) The location of existing buildings on the site

d) The existing and potential use of adjoining properties

e) Any proposed attenuation measures; and

f) Any buffers created by natural or other features.

BACKGROUND

The subject title (CT 109824/1) is 651ha in area. There is a second title (CT 155944/1) to the north west that is under the same ownership and is 127ha in area. Hence, the total area of the Nosswick property is 778ha. The May 2022 *Agricultural Assessment and Compliance Report* by Pinion (the Ag report) identifies the agricultural activities associated with the property as follows:

- Approximately 10,000 head of sheep. The potential carrying capacity is identified as 22.43 DSE/ha. An annual gross margin for the sheep enterprise has been calculated at approximately $450,000.
- The property has 1,485ML of allocated water associated with an existing 1,155ML capacity dam and another proposed dam with a capacity of 212.6ML.
- The majority of land is mapped as Class 4, and aerial imagery indicates there are 12 centre pivot irrigators across the property, with approximately 340ha under centre pivot irrigators.
- The Class 4 areas of the farm are utilised for a restricted range of annual crops in a two in 10-year rotation. The Ag report indicates that various vegetables and broadacre crops are grown within the rotation. The gross margins of the irrigated crops vary from $1,500/ha for grass seed and $1,000/ha for peas.

PROPOSED DEVELOPMENT

The proposed visitor accommodation will be located near the existing dam on the northern face of a slight hilltop. The published Land Capability of the building site is Class 4, however, an onsite Land Capability Assessment was done for the development site, and immediately adjacent land, by Pinion, which determined the development site is actually Class 6 land. The development site is located approximately 80m from the property boundary with the adjacent property to the south (1363 Blackwood Creek Rd). The Ag report indicates that the setback to the adjacent land is buffered by topography and existing vegetation.

REPRESENTATION

When the proposed development was advertised, Council received a representation against the proposed development. We have also reviewed this representation from Woolcott Surveys, dated 05/07/2023, which was written on behalf of John and Nancy Bell who own the adjacent property at 1363 Blackwood Creek Rd. The representation identifies the following concerns/issues:

- Use of an access track which is partially located on the appellant's property.
- Inappropriate setback to agricultural land on adjacent title (CT 52054/4) where irrigation infrastructure is planned to be developed.
- Proximity of proposed visitor accommodation to a newly built farm dam on the appellant's property.
- Use of firearm within 250m of the visitor accommodation.

DISCUSSION

The Ag report indicates that the proposed development is located on Class 6 land that accounts for less than 0.05% of the total property. This area is not currently used for cropping or grazing. The Ag report indicates that the proposed accommodation will therefore not impact on the existing agricultural enterprise. We agree with this assessment. Furthermore, the proposal has the potential to add value to the agricultural enterprise by providing additional workers accommodation in peak periods, as well as provide a supplementary income via visitor accommodation in non-peak periods.

The Ag Report indicates that the proposed development is 80m from that adjacent property to the south (1363 Blackwood Creek Rd) but this setback is buffered by topography and existing vegetation. The representation states that the topography is flat and that there is no vegetation between the proposed visitor accommodation and the adjacent property that acts as a buffer. Aerial imagery indicates there is insufficient vegetation present to be considered an appropriate buffer. The 1m contours indicate that the boundary between the two properties is 5m below the proposed development area, hence the average slope over the 80m that separates the proposed visitor accommodation, and the adjacent boundary, is approximately 3º. However, we also note that the highest point on the hilltop, south of the proposed accommodation, is 206.5m in elevation. Hence, depending on the exact location and survey data, there is potentially around 2m vertical difference between the footings of the accommodation and the crest of the hill immediately to the south. In our opinion a 2m difference in elevation does provide a buffer from a topographical perspective.

As identified in Appendix 4, RMCG would generally recommend a minimum buffer of 50m between a new dwelling (or visitor accommodation) and an adjacent title, if the adjacent land use is dryland grazing only. Hence, in this situation, based on the Ag report description of the adjacent land, we would agree that the proposed 80m buffer is sufficient. However, based on the additional information provided by the representor, including draft irrigation plans (developed by Pinion) it appears that significant investment of irrigation infrastructure is proposed on the adjacent property, which includes a centre pivot irrigator that will be located within approximately 170m of the proposed visitor accommodation.

Given the proposed pivot is located on land mapped as Land Capability Class 4 (the LIST), it is considered likely that a similar cropping regime to the subject property (two in 10-year) would be established within this pivot. Hence, the Planning Scheme defined 200m setback is appropriate to the pivot. However, in our opinion, if a vegetation buffer was established between the proposed visitor accommodation and the adjacent property, then this would assist with offsetting the reduced setback. See Figure A2-2 for an example of where a vegetation buffer could potentially occur.

The farm track that appears to be the main access point to the proposed development has a section that is located on the adjacent property (1363 Blackwood Creek Rd). As per the representation, the proponent does not have permission to use this access track as part of the development proposal and there is no Right of Way associated with the access. Hence, a new access should be developed that does not encroach on the adjacent land.

See Figure A2-1 which shows the approximate location of the new dam (ID 10483) on 1363 Blackwood Creek Rd, associated contours, and the proposed location of the visitor accommodation. Contours on the map are 1m contours sourced from available Lidar data. Based on the contours, the dam wall crest is constructed to just above the 204m Above Sea Level (ASL) contour and the proposed visitor accommodation appears to be located above this. However, the exact location of the accommodation and elevation of the footings has not been provided. The highest contour on the hilltop in the vicinity of the accommodation is 206.5m and the accommodation is located on the northern side of this hilltop. As a result, the Consequence Category[1] of the dam is considered to not be impacted by the proposed accommodation, as the proposed accommodation is above the flood inundation area in the event of a dam failure. In response to the representations third point, the *Water Management Act 1999* and the *Water Management (Safety of Dams) Regulations 2015* ensure

[1] The impact on the Consequence Category has been assessed by Astrid Ketelaar, who has Class 2 engineering competence as defined under the Water Management (Safety of Dams) Regulations 2015 and is appropriately qualified to undertake this assessment.

owners of existing dams meet their dam safety responsibilities. Responsibility of ongoing dam management and safety lies with the dam owner, including being aware of potential changes to a dam's consequence category and resulting dam safety inspection and reporting requirements as a result of downstream development. Hence, it is not required for the proponent to discuss the application with the Department of Natural Resources and Environment Tasmania.

The representation also points out that if they are wanting to discharge a firearm to control wildlife then they would need permission from the occupant/owner of the any residential building with 250m. We agree this is a requirement, however, also note that the Planning Scheme Acceptable Solution of a 200m setback for a dwelling/sensitive use to an adjacent boundary also does not deal with this issue. In this situation, given both properties are managed as commercial farms, it seems reasonable that through open lines of communication, an agreement around managing wildlife could be made between the two landowners.

In the event that such an agreement cannot be reached, approximately 5.6ha will be impacted by a shooting exclusion zone.

SUMMARY

- The proposed visitor accommodation is located on a section of the subject property that has negligible agricultural potential, and the proposed development will not negatively impact the existing enterprise. In fact, it has the potential to provide additional worker accommodation and revenue.
- Based on the adjacent property's proposed irrigation developments, there is a minor risk that the proposed visitor accommodation could impact on the adjacent land use. To rectify this, a vegetation buffer between the pivot and the visitor accommodation should be established on the proponent's land.
- An alternate access to the development area would need to be developed that does not rely on the existing track where it crosses on to the neighbouring property, unless consent is given by the adjacent landholder.
- Based on 1m contours, the proposed visitor accommodation does not impact on the Consequence Category of the existing dam.
- An agreement between the proponent and the representor should be developed that considers how using a firearm to manage wildlife can work if it is proposed for a firearm to be used within 250 of the proposed visitor accommodation.

If you have any further queries, please don't hesitate to contact me.

Kind regards,

Michael Tempest

SENIOR CONSULTANT

Appendix 1: Planning Assessment

This Planning Assessment is based on information provided in the *Agricultural Assessment and Compliance Report*, by Pinion dated 7 May 2022. It is noted that the Pinion Report addressed the clauses of the previous Northern Midlands Interim Planning Scheme 2013. Hence, the assessment in this review has considered the general information provided in the Pinion Report, our own examination of the publicly available datasets, as well as the information provided in the Representation by Woolcott Surveys on behalf of the Bells when considering compliance against the two identified Planning Scheme clauses; 21.3.1.P2 and 21.4.2.P2.

Table A1-1: Identified Planning Scheme clauses

21.3.1 Discretionary uses *Performance Criteria* *P2 – A use listed as Discretionary, excluding Residential, must minimise the conversion of agricultural land to non-agricultural use, having regard to:* *a) The area of land being converted to non-agricultural use;* *b) Whether the use precludes the land from being returned to an agricultural use;* *c) Whether the use confines or restrains existing or potential agricultural use on the site or adjoining sites.*
Response a) The area where the proposed visitor accommodation will occur is located on a part of the farm that is not utilised for cropping or grazing. It has been assessed as having a Land Capability Class of 6 and so has negligible agricultural potential. It is also located in a part of the farm that is removed from the main grazing and cropping areas. The amount of land being converted is approximately 0.05% of the total property. The loss will have no impact on the existing agricultural operations of the farm. b) It is unlikely that the land would be converted back to agricultural use once the new building is constructed. However, this will have no impact on the overall farming operation. c) The proposed use is located in an area of the farm that is not utilised for agriculture. It will have no impact on the operational areas of the farm. The extra workers accommodation and occasional visitor accommodation will facilitate the farming operations and assist with providing additional farm income. Given that there is a proposed centre pivot on the adjacent title within 200m of the proposed use, there is a low risk that the proposed use could restrain future uses on the adjacent land, as there is a topographical buffer. A vegetated buffer would further minimise this risk.

21.4.2 Setbacks *Performance Criteria* *P2 Buildings for a sensitive use must be sited so as not to conflict with an agricultural use, having regard to:* *a) The size, shape and topography of the site;* *b) The prevailing setbacks of any existing buildings for sensitive uses on adjoining properties;* *c) The location of existing buildings on the site* *d) The existing and potential use of adjoining properties* *e) Any proposed attenuation measures; and* *f) Any buffers created by natural or other features.*

Response

a) The proposed location of the new use is on the northern face of a slight hilltop that is adjacent to an existing dam to the north. The aspect is easterly. The overall size of the subject title is 651ha, while the proposed development area will be less than 0.25ha.

b) There is a dwelling located on 433 Blackwood Creek Rd (CT 50856/1), adjacent to the west of the subject title, that is approximately 100m from the subject titles south western boundary. There are no other sensitive uses with 100m of the subject title.

c) The existing property homestead is located approximately 1.7km to the west of the proposed development site. The homestead is located in the central area of the property and is near the main farm sheds. There is a manager's residence on the subject title that is 465m to the west of the proposed development area. The proposed development would have no impact on either of the existing dwellings on the site or other existing farm buildings.

d) The nearest adjacent property is 1363 Blackwood Creek Rd, which is 80m to the south of the proposed development area. At the time the Ag Report by Pinion was completed, and also based on aerial imagery, the current adjacent land use on 1363 Blackwood Creek Rd is dryland grazing. However, as per the representation from the adjacent landowner, there are plans for the adjacent land to have significant irrigation infrastructure development. This will include a centre pivot irrigator that will be located approximately 170m from the proposed visitor accommodation. If the adjacent land use was going to continue to be dryland grazing, then, due to the low intensity nature of this activity (see Appendix 3 for potential conflict issues), the proposed 80m setback would be sufficient. However, because there are plans for the adjacent land to be further developed for irrigation, it is considered highly likely that the adjacent land use will intensify. Because of this, a 200m setback from the proposed adjacent centre pivot is considered appropriate. However, if a vegetation buffer is established between the pivot and the proposed visitor accommodation, similar to what is shown in Figure A2-2, then the 170m will be sufficient as there is already some topographic buffering afforded by the hilltop immediately south of the proposed accommodation. All other adjacent properties are greater than 200m from the proposed development site.

e) A multi-tiered, dense vegetation buffer with a width of 5-10m between the proposed development site and the adjacent property to the east (1363 Blackwood Creek Rd) will provide an adequate buffer from the visitor accommodation to the proposed new centre pivot on the adjacent property.

f) There are natural buffers to the west, north and south, such as changes in topography and existing native vegetation that buffer the proposed development from the main farming areas of the subject title.

Appendix 2: Maps

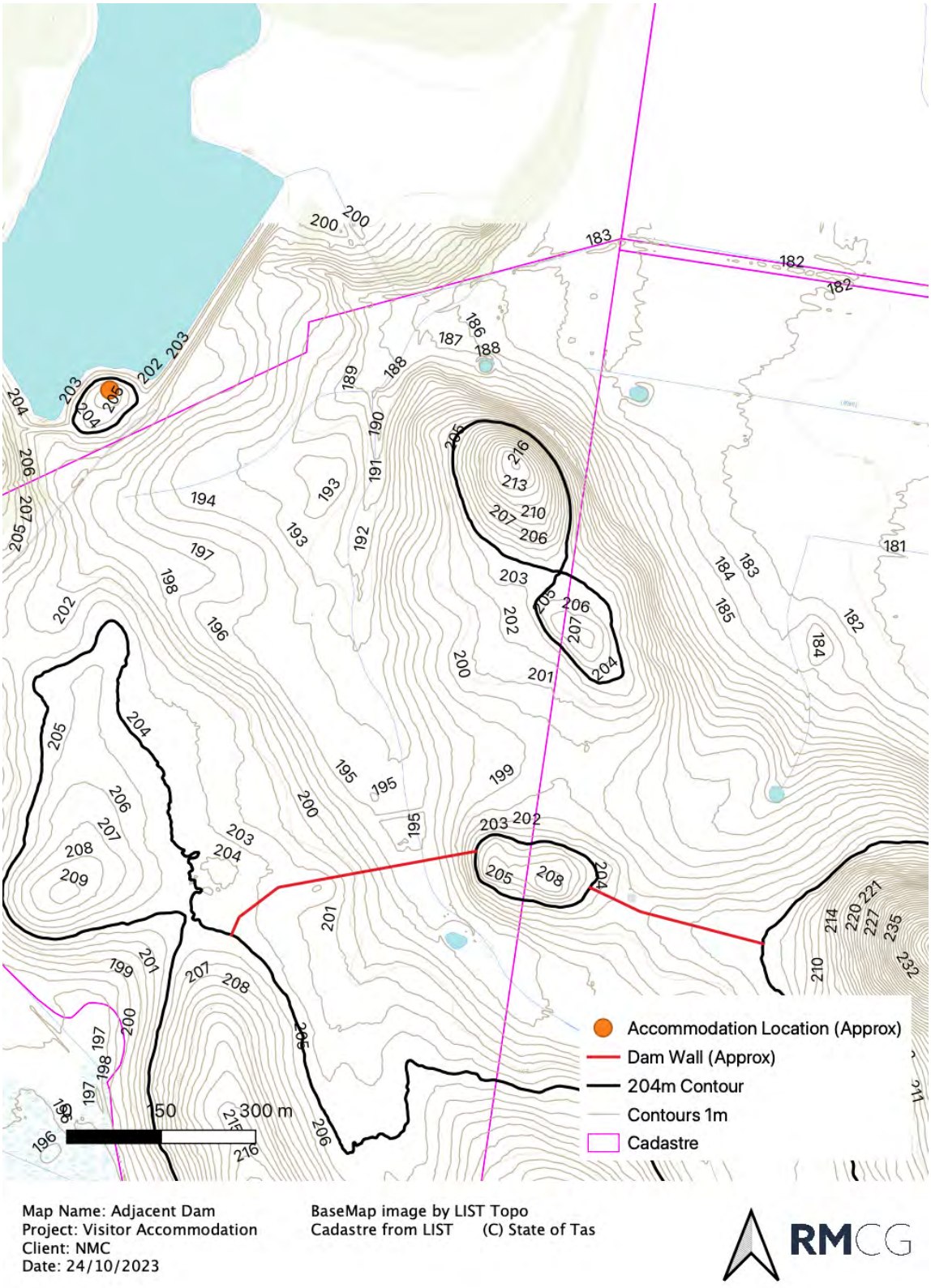

Figure A2-1: Adjacent Dam Wall. Note the 206m contour on the hilltop at the accommodation site is not visible due to the scale of the map

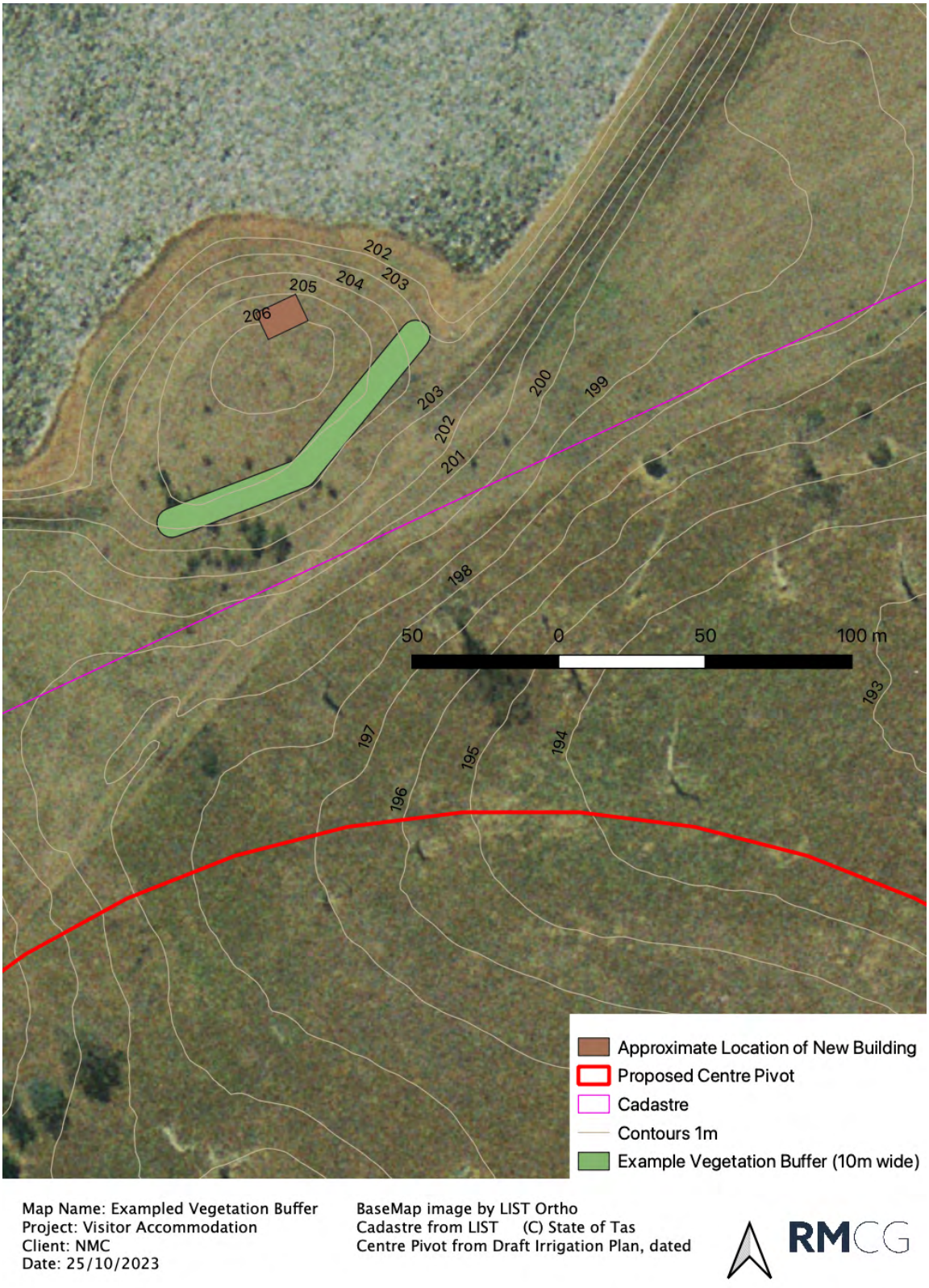

Figure A2-2: Example Vegetation Buffer. Note the 206.5m contour on the hilltop at the accommodation site is not visible as only the 1m contours are shown. The approximate location has been transcribed from the Ag report, however it is likely to be slightly further north and therefore at lower elevation.

Appendix 3: Potential conflict issues

Tables A3-1 to A3-3 describes the frequency and intensity of adjacent activities and the associated issues likely to constrain this use. These are a broad guide only and site specific, cultivar specific and seasonal variations occur. Aside from these specific issues associated with grazing Learmonth et. al. (2007)[2] also provides a comprehensive list of potential land use conflict issues (see Figure A3-1). Table A5-1 provides the rationale behind the recommended minimum buffers contained in Table A4-1 (Appendix 4).

Table A3-1: Farming activity – Irrigated Grazing

MANAGEMENT ACTIVITY	ISSUES LIKELY TO CONSTRAIN THE ACTIVITY	COMMENT
Pasture sowing Herbicide spraying Cultivation Drilling	Spray drift, noise Noise, dust Noise, dust	Ground based or aerial – often very early in the morning
Graze	Noise at certain time e.g. weaning calves Livestock trespass	Tractor
Forage conservation Mow, Rake, Bale, Cart bales	Noise, dust	Tractor
Fertiliser spreading	Noise	Tractor
Insecticide spraying	Spray drift Noise	Ground based or aerial – often very early in the morning

Table A3-2 Farming activity – Grazing

MANAGEMENT ACTIVITY	ISSUES LIKELY TO CONSTRAIN THE ACTIVITY	COMMENT
Pasture sowing Herbicide spraying Cultivation Drilling	Spray drift, noise, dust	Ground based or aerial – often very early in the morning
Grazing	Livestock trespass, noise at certain time e.g., weaning calves	
Forage conservation including mowing, raking, baling, carting bales	Noise, dust	
Fertiliser spreading	Noise	
Insecticide spraying	Spray drift, noise	Ground based or aerial
Irrigation	Spray drift, noise (pump)	Potentially turbid and not potable

[2] Learmonth, R., Whitehead, R., Boyd, B., and Fletcher, S. (2007). Living and Working in Rural Areas. A handbook for managing land use conflict issues on the NSW North Coast.

Table A3-3: Farming Activity – Poppy Crop

MANAGEMENT ACTIVITY	ISSUES LIKELY TO CONSTRAIN THE ACTIVITY	COMMENT
Pre-cultivation spraying	Spray drift, noise	Ground based or aerial
Cultivation – several passes (2-4)	Noise, dust	Dust is unlikely as soils are likely to be moist
Lime spreading	Noise	
Drilling	Noise	Can be very early in the morning
Herbicide spraying (2 passes)	Spray drift, noise	Ground based or aerial
Insecticide & fungicide spraying (2-3 passes)	Spray drift, noise	Ground based or aerial
Irrigation	Spray drift, noise	Potentially turbid and not potable
Harvesting	Noise	
Potential forage crop after harvesting	Noise	

Issue	Explanation
Absentee landholders	Neighbours may be relied upon to manage issues such as bush fires, straying stock, trespassers etc. while the absentee landholder is at work or away.
Access	Traditional or informal 'agreements' for access between farms and to parts of farms may break down with the arrival of new people.
Catchment management	Design, funding and implementation of land, water and vegetatin management plans are complicated with larger numbers of rural land-holders with differing perspectives and values.
Clearing	Neighbours may object to the clearing of trees, especially when it is done apparently without approvals or impacts on habitat areas or local amenity.
Cooperation	Lack of mutual co-operation through the inability or unwillingness on behalf individuals to contribute may curtail or limit traditional work sharing practices on-farm or in the rural community.
Dogs	Stray domestic dogs and wild dogs attacking livestock and wildlife and causing a nuisance.
Drainage	Blocking or changing drainage systems through a lack of maintenance or failure to cooperate and not respect the rights of others.
Dust	Generated by farm and extractive industry operations including cultivating, fallow (bare) ground, farm vehicles, livestock yards, feed milling, fertiliser spreading etc.
Dwellings	Urban or residential dwellings located too close to or affecting an existing rural pursuit or routine land use practice.
Electric fences	Electric shocks to children, horses and dogs. Public safety issues.
Fencing	Disagreement about maintenance, replacement, design and cost.
Fire	Risk of fire escaping and entering neighbouring property. Lack of knowledge of fire issues and the role of the Rural Fire Service.
Firearms	Disturbance, maiming and killing of livestock and pest animals, illegal use and risk to personal
Flies	Spread from animal enclosures or manure and breeding areas.
Heritage management	Destruction and poor management of indigenous and non indigenous cultural artefacts, structures and sites.
Lights	Bright lights associated with night loading, security etc.
Litter	Injury and poisoning of livestock via wind blown and dumped waste. Damage to equipment and machinery. Amenity impacts.
Noise	From farm machinery, scare guns, low flying agricultural aircraft, livestock weaning and feeding, and irrigation pumps.
Odours	Odours arising from piggeries, feedlots, dairies, poultry, sprays, fertiliser, manure spreading, silage, burning carcases/crop residues.
Pesticides	Perceived and real health and environmental concerns over the use, storage and disposal of pesticides as well as spray drift.
Poisoning	Deliberate poisoning and destruction of trees/plants. Spray drift onto non-target plants. Pesticide or poison uptake by livestock and human health risks.
Pollution	Water resources contaminated by effluent, chemicals, pesticides, nutrients and air borne
Roads	Cost and standards of maintenance, slow/wide farm machinery, livestock droving and manure.
Smoke	From the burning of crop residues, scrub, pasture and windrows.
Soil erosion	Loss of soil and pollution of water ways from unsustainable practices or exposed soils. Lack of adequate groundcover or soil protection.
Straying	Fence damage, spread of disease, damage to crops, gardens and bush/rainforest
Theft/vandalism	Interference with crops, livestock, fodder, machinery and equipment.
Tree removal	Removal of native vegetation without appropriate approvals. Removal of icon trees and
Trespass	Entering properties unlawfully and without agreement.
Visual/amenity	Loss of amenity as a result of reflective structures (igloos, hail netting), windbreaks plantings
Water	Competition for limited water supplies, compliance with water regulations, building of dams, changes to flows. Stock access to waterways. Riparian zone management.
Weeds	Lack of weed control particularly noxious weeds, by landholders.
	Based on: Smith, RJ (2003) Rural Land Use Conflict: Review of Management Techniques – Final Report to Lismore Living Centres (PlanningNSW).

Figure A3-1: Typical rural land use conflict issues (Learmonth et al. 2007)

Appendix 4: Separation distances and buffers

Farm business activity scale[3] in combination with Table A4-1 can be used to provide guidance on appropriate separation distances when there are no additional mitigating factors. Appendix 3 provides guidance on constraints and potential conflict issues in relation to the relevant current and potential farming activities in proximity to a sensitive use.

Table A4-1: Separation distances

RESOURCE	LIVESTOCK			BROAD ACRE CROPS		VEGETABLES		BERRIES	ORCHARD FRUITS & VINES	NURSERIES & CUT FLOWERS	FORESTRY PLANTATIONS
	SHEEP	CATTLE	DAIRY	CEREALS	OTHERS	PROCESSED	FRESH MARKET				
Recommended min. buffer for individual dwellings (1)	50m to dryland and 100m to irrigated grazing area (3)	50m to dryland and 100m to irrigated grazing area.(3).	50m to dryland and, 100m to irrigated grazing, 300m to dairy shed and 250m to effluent storage or continuous application areas (2).	200m to crop.	200m to crop.	200m to crop.	200m to crop.	200m to crop.	200m to crop.	200m to crop.	100m from crop for aerial spraying.
Recommended min. buffer for residential areas (1)	50m to dryland and 100m to irrigated grazing area (3)	50m to dryland and 100m to irrigated grazing area.(3)	50m to dryland and, 100m to irrigated grazing, 300m to dairy shed and 250m to effluent storage or continuous application areas (2).	300m to crop.	300m to crop.	300m to crop.	300m to crop.	300m to crop.	300m to crop.	300m to crop.	Site specific (1).

Table notes:

1. From (Learmonth, Whitehead, Boyd & Fletcher, 2007). These are industry specific recommended setbacks which do not necessarily align with Planning Scheme Setback requirements. Council should ensure they are aware of attenuation setback requirements for specific activities.
2. The State Dairy Effluent Working Group, 1997 uses 50m to grazing area, 250m to dairy shed and 300m to effluent storage or continuous application areas. The State Planning Scheme uses 300m to diary shed and 250m to effluent lagoon
3. Learmonth, Whitehead, Boyd & Fletcher, 2007 uses 50m from grazing areas.

3 RMCG (January 2022). Enterprise Scale – For primary production in Tasmania. Report prepared to further the concept of the Rural Enterprise Concept for Flinders Local Provisions Schedule. Report prepared for Town Planning Solutions on behalf of Flinders Council

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Document review and authorisation

Project Number: #2199

Doc Version	Final/Draft	Date	Author	Project Director review	BST QA review	Release approved by	Issued to
1.0	Final	27/10/2023	M. Tempest	A. Ketelaar	M. McIntosh	A. Ketelaar	P. Godier

PLANNING APPLICATION

Proposal

Description of proposal:

The Proposal is for a Battery Energy Storage System (BESS) and associated infrastructure, defined as 'Utilities' in the Northern Midlands Planning Scheme. The proposed BESS has a nameplate size of around 100 MW for two hours, representing 200 MWh capacity. The electrical components of the BESS include multiple lithium-ion batteries, as well as bi-directional inverters, transformers, electrical conduits, and a 33 kV reticulation to Palmerston Substation. Associated infrastructure includes access tracks, road upgrades, perimeter fencing, on-site offices, maintenance and storage sheds and on-site vegetationscreening.

Please refer to the enclosed Planning Report for a full description of the Proposal, and the permit triggers against the Northern Midlands Planning Scheme.

……
(attach additional sheets if necessary)

If applying for a subdivision which creates a new road, please supply three proposed names for the road, in order of preference:

1…… 2…… 3……..

***Site address**:*

1440 Saundridge Road, Cressy, 7302 Tasmania
……..

CT no: See attached list of Certificate of Title

Estimated cost of project *$*…150 million *(include cost of landscaping, car parks etc for commercial/industrial uses)*

Are there any existing buildings on this property? [*Yes* / *No*
If yes – main building is used as …… See enclosed planning report

If variation to Planning Scheme provisions requested, justification to be provided:

N/A

……..

……..

……..

……..
(attach additional sheets if necessary)

Is any signage required? ……No……..
(if yes, provide details)

cogency

10 August 2023

Paul Godier, Senior Planner
Northern Midlands Council
PO Box 156
LONGFORD TAS 7301
By email: council@nmc.tas.gov.au

Our Project Ref: 2225

Dear Paul,

DEVELOPMENT APPLICATION – PALMERSTON BATTERY ENERGY STORAGE SYSTEM (BESS)

Cogency Australia Pty Ltd (Cogency) acts for Akaysha Energy Pty Ltd (the Proponent). Akaysha propose to develop the 'Palmerston BESS' (the Proposal); a large-scale battery energy storage system (BESS) adjacent to the existing Palmerston Substation, with underground cable connection to the substation.

On behalf of Akaysha, we are pleased to submit this Discretionary Development Application (DA) for the Proposal. The enclosed DA package outlines the anticipated use and development of land for 'Utilities', as defined within the Tasmanian Planning Scheme - Northern Midlands. The Proposal is primarily on 1.5 hectares of private land known as 1140 Saundridge Road Cressy, although also utilises the Palmerston Substation land for electrical infrastructure and connection and road access (the Site).

The Palmerston BESS will provide significant benefits to the State and the Northern Midlands area in particular. The purpose of the Proposal is to store electricity at times of surplus, and discharge at times of need, and provide load deferral and inertia services to Tasmania's electricity network. In doing so it will thereby improve its stability and enable the continued integration of renewable energy resources.

The use as 'Utilities' requires planning approval. The following DA triggers apply, with reliance upon some Performance Criteria among the Use and Development Standards:

- General Provisions Clause 7.5.1(a): change of use where the change of use is to a discretionary use
- Clause 21.2 Use Table: Discretionary Use Class (Agriculture Zone), relies upon some Performance Criteria
- Clause 26.2 Use Table: Permitted Use Class (Utilities Zone – Palmerston Substation), relies upon some Performance Criteria
- Clause C2.0 Parking and Sustainable Transport Code, relies upon some Performance Criteria
- Clause C3.0 Road and Railway Assets Code, relies upon some Performance Criteria
- Clause C4.0 Electricity transmission infrastructure protection, relies upon some Performance Criteria
- Clause 7.0 Natural assets (Waterway and coastal protection area only), relies upon some Performance Criteria

To support Council's assessment of the DA, please find enclosed with this application the following documents:

- Application form, signed
- Planning Report, Cogency Australia
- Details of Certificates of Title
- Site Layout, Cogency Australia
- Native Vegetation Assessment, Nature Advisory
- Aboriginal Cultural Heritage Assessment, CHMA
- Traffic Impact Assessment, Pitt & Sherry

- Landscape and Visual Impact Assessment, Orbit Solutions
- Noise Impact Assessment, SLR Consulting
- Fire Hazard and Risk Assessment, NJM Design

As demonstrated within this DA package, the Proposal has been rigorously designed and assessed. Based on the supporting technical impact assessments, the Proposal is not expected to generate any unreasonable or significant environmental or community impacts and offers benefits Tasmania-wide. The Proposal will support Tasmania's legislated renewable energy targets and support economic development within the local region.

The Site is well suited to a BESS as it benefits from adjacency to the Palmerston Substation, reducing the need for lengthy transmission line connection, and is visually compatible with existing infrastructure in the vicinity. As the Proposal is located on highly disturbed agricultural land and distant from nearby dwellings in the area, there is no impact on natural values, places of cultural significance, or residential dwellings. The careful siting of the Proposal in the unused corner of a centre-pivot irrigation paddock means there will be no negative impact upon existing agricultural activities.

For the reasons outlined above and in the enclosed Planning Report, it is considered that the Proposal warrants planning approval. Furthermore, please note that all landowners have been notified of the Proposal and DA lodgement.

Please refer to the Planning Report and accompanying technical assessments for further information. Should you have any questions, please do not hesitate to contact me on 04 22 424 144 or at billy@cogencyaustralia.com.au.

Thank you for your consideration of this matter and we look forward to receiving a response.

Yours Sincerely,

Billy Greenham
Associate Director
Cogency Australia

Palmerston BESS Planning Application Report

Akaysha Energy Pty Ltd

Document Details

Palmerston BESS

Project No:	2225
Report Name:	Palmerston BESS Planning Application Report
Revision:	1
Date:	9 August 2023
Client:	Akaysha Energy Pty Ltd

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Document history

Revision	Date	Description	Author	Approved
1	01/01/2023	2225 Planning Application Report First Draft	BS	AT
2	24/07/2023	2225 Planning Application Report Second Draft	AP, BG	AT
3	09/08/2023	2225 Planning Application Report Final	AP, BG	AT

Executive Summary

Akaysha Energy Pty Ltd (the Proponent) have engaged Cogency Australia Pty Ltd (Cogency), a planning and engagement firm, to prepare the enclosed Planning Application to be lodged with the Northern Midlands Council (the Planning Authority) for permit approval.

This Planning Report supports an application for the use and development of land for Utilities (Battery Energy Storage System and electricity transmission infrastructure), known as the Palmerston Battery Energy Storage System (BESS) (the Proposal). The Proposal is primarily located on land at 1440 Saundridge Road, Cressy as well as connecting into the Palmerston Substation (the Site). The purpose of this report is to provide the Planning Authority and any referral authorities with comprehensive detail of the Proposal. This includes detail on the Proponent and project team, design and built features, potential impacts, and compliance with relevant Acts, regulations, plans, land use controls and guidelines, contained primarily within the Tasmanian Planning Scheme – Northern Midlands (the Planning Scheme).

The Proposal is defined as 'Utilities' within the Planning Scheme, listed as a Discretionary Use Class within the Agriculture Zone. The Proposal's Development Area is to be located primarily within 1.5 ha of cleared and highly modified agricultural land within a broader 247 ha property that is private freehold land.

The Proposal includes multiple lithium-ion batteries connected in series, bidirectional inverters and transformers, switchgear and electrical conduits, access tracks and road upgrades, perimeter fencing, on site offices, maintenance and storage sheds, on-site vegetation screening, and associated works. An underground 33 kV line will ensure grid connection to Palmerston Substation, with associated expansion of the substation facility.

The Proposal is located within the Agriculture Zone (Clause 21.0 of the Planning Scheme) and its permit approval does not require a rezoning. The following triggers apply to the Proposal, with reliance upon some Performance Criteria among the Use and Development Standards:

- Clause 21.2 Use Table: Discretionary Use Class (Agriculture Zone), relies upon some Performance Criteria
- Clause 26.2 Use Table: Permitted Use Class (Utilities Zone – Palmerston Substation), relies upon some Performance Criteria
- Clause C4.0 Electricity transmission infrastructure protection, relies upon some Performance Criteria
- Clause 7.0 Natural assets (Waterway and coastal protection area only), relies upon some Performance Criteria
- Clause C13.0 Bushfire-prone areas, relies upon some Performance Criteria

Based on technical impact assessments, the Proposal is not expected to generate any unreasonable or significant environmental or community impacts. It will provide significant benefits to the State and the Northern Midlands area in particular. In short:

- The Proposal will help store and discharge electricity using advanced lithium-ion batteries and provide inertia services to help improve the strength of the Tasmanian and National electricity grid.
- It will support the transition to 100% renewables by allowing increased renewable energy generation, and help meet Tasmania's 200% renewable energy goal.
- The site is well suited to a BESS as it benefits from adjacency to the Palmerston Substation, reducing the need for lengthy transmission lines, and is visually compatible with existing infrastructure in the vicinity.
- The site is strategically located within a Renewable Energy Zone (REZ) and proximate to a number of Tasmania's key high voltage transmission lines, offering benefits Tasmania wide including supporting the 'battery of the nation' objectives and Marinus link.
- The Proposal is located on highly disturbed agriculture land and distant from nearby dwellings, therefore there is no impact on natural values or places of cultural heritage significance.
- The Proposal has been strategically sited and designed to avoid impacting agricultural activities in the vicinity, particularly pivot irrigation.

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1. Introduction

Cogency Australia Pty Ltd (Cogency) have been engaged by Akaysha Energy Pty Ltd (the Proponent) to prepare and lodge a Development Application for a Battery Energy Storage System (BESS) at 1440 Saundridge Road, Cressy (the Proposal). The Proposal is known as the Palmerston BESS.

Cogency is a boutique planning and engagement firm, focused on renewable energy projects. The Proponent is a significant national development company that specialises in NEM-connected battery assets. It is comprised of industry experts, and is a subsidiary of BlackRock, the world's largest asset management firm.

The development application is for the use and development for Utilities. 'Utilities' is defined as '*The use of land for utilities and infrastructure' including:*

- (c) transmitting or distributing gas, oil or electricity.

The Site comprises four parcels of land, detailed in Appendix A. Of these parcels, the private freehold land known as 1440 Saundridge Road, Cressy will host the majority of the Proposal. The other lots form the Palmerston Substation and its access road (owned by TasNetworks) and will only be used for transmission connection and associated electrical infrastructure.

The proposed BESS will occupy approximately 1.5 ha of the 247 ha freehold property and has a nameplate size of 100MW for two hours, representing 200 MWh capacity.

The electrical elements of the Proposal include multiple lithium-ion batteries, as well as bidirectional inverters, transformers, switchgear, electrical conduits and a 33 kV reticulation to the Palmerston Substation. Other ancillary development includes access tracks, road upgrades, perimeter fencing, on site offices, maintenance and storage sheds, on-site vegetation screening and associated works.

The purpose of the Proposal is to store electricity at times of surplus, and discharge at times of need, and provide load deferral and inertia services to Tasmania's electricity network, thereby improving its stability and enabling the continued integration of renewable energy resources, including Tasmania's famous hydro resources.

The Proposal is located within the Poatina locality, and the immediate surrounds are intensively used for agriculture, mostly grazing and irrigated cropping. The Site, however, is unproductive as it is the corner segment of a square paddock irrigated using a centre-pivot, and is regarded as surplus land by the freehold landowner. The Site, due to its adjacency to the Palmerston Substation, is well-suited for the Proposal, features no remnant native or treed vegetation, and is adequately distanced from sensitive receptors.

The land is currently zoned Agriculture Zone (Clause 21.0) under the Northern Midlands Planning Scheme 2022. The Proposal is defined as a Utilities use and are permitted on agriculturally zoned land with planning approval (Discretionary). The Planning Authority for this approval is the Northern Midlands Council (Council).

This Planning Report summarises the Proposal, details the Site and locality, outlines its key environmental impacts, and provides an assessment of the Proposal against relevant Commonwealth, State and local planning policy and controls.

A full range of detailed technical reports support this application, from the following consultant team:

- Cogency: Planning and environmental assessment, community engagement
- Nature Advisory: Native Vegetation Assessment (Appendix C)
- Cultural Heritage Management Australia (CHMA): Aboriginal Cultural Heritage Assessment (Appendix D)
- Pitt & Sherry: Traffic Impact Assessment (Appendix E)
- Orbit Solutions: Landscape and Visual Impact Assessment (Appendix F)
- SLR Consulting: Noise Impact Assessment (Appendix G)
- NJM Design: Fire Hazard and Risk Assessment (Appendix H)

The supporting reports listed above should be read in conjunction with this Planning Report.

1.1 Proposal Summary

The Palmerston BESS will comprise the use and development of an advanced, grid connected battery facility, offering a capacity of 100 MW / 200 MWh. The Proposal will comprise multiple lithium-ion batteries, connected in series, as well as:

- bidirectional inverters and transformers,
- switchgear and electrical conduits,
- access tracks and road upgrades,
- perimeter fencing,
- on-site vegetation screening,
- on site office
- maintenance and storage sheds
- a 33 kV reticulation to the Palmerston Substation and expansion of substation facilities, and
- associated works.

1.2 The Proponent

Detail	
Proponent	Akaysha Energy Pty Ltd
ABN	49 649 223 987
ACN	649 223 987
Registered Address	11 - 13 Pearson Street, Suite 1.01 Cremorne

Akaysha are a specialised company focused on the end-to-end development of BESS and Renewables Projects. They are based in Melbourne and made up of long-standing energy sector professionals experienced in the development and deployment of large-scale batteries and renewables in Australia.

Akaysha are currently developing the Waratah Super Battery for the NSW Government, along with several other BESS projects around Australia. Akaysha are backed by BlackRock, one of the largest investors in the world.

1.3 Proposal Vision

Tasmania has long been focussed on renewable energy production and is a leader in the global effort to reduce greenhouse gas emissions. However, it is subject to unpredictable weather events and its renewable energy resources are not always able to fully meet the State's energy needs. As such, there is a requirement for resources that can improve the resilience of the electricity grid and provide a consistent energy supply. The development of utility-scale BESS' presents a solution to this challenge, as a BESS can be used to store energy produced by renewable resources, such as wind, solar and hydro, to be used when required at other times.

Further, the Proposal will support the Tasmania's world class hydro system by offering less climate-dependant grid services and electricity dispatch. The Proposal can make a material contribution to Tasmania's ambitious 200% renewable energy goal. Other direct environmental benefits include reducing the need for fossil fuel energy generation. This brings the Proposal into strong alignment with key State government climate objectives.

Further, the construction of a BESS can benefit the local economy by creating jobs, particularly during the construction phase. A preliminary assessment suggests that the Proposal would create approximately 75-100 jobs during the construction phase and 5-10 jobs during operation.

In addition to these benefits, the Site is highly suitable, due to the non-productive agricultural pocket of land, adjacency to the Palmerston Substation, minimal ecological value, distance from sensitive receptors, and avoidance of impacts to nearby ongoing or intensified agricultural or other primary production uses.

1.4 Site and Development Area

The Site comprises multiple parcels of land, although the development is primarily located upon a single freehold parcel:

- The primary parcel: 1440 Saundridge Road, Cressy, and
- Palmerston Substation (transmission connection only) and private substation access road.

Within the Site parcels, the Development Area is contained within a paddock corner adjacent to the Palmerston Substation. Figure 1 shows the Site and Development Area, and Table 1 provides full title details for the Site.

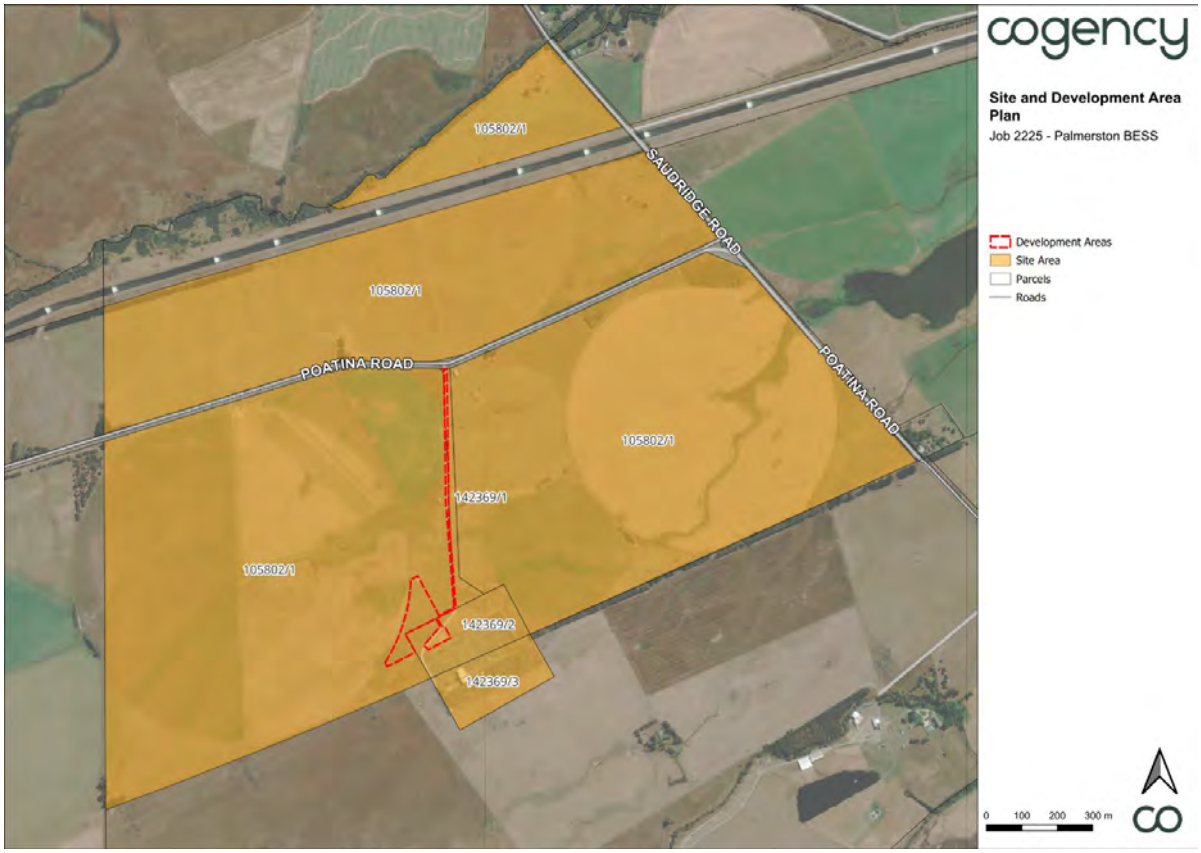


Figure 1 Site and Development Area

The Proposal does not contravene any easements or restrictions upon the Titles.

Table 1 Site Title Details

Address	Council Property ID	Title Detail	Easements / Restrictions?
1440 Saundridge Road, Cressy TAS 7302	6753396	105802/1	Yes – listed in folio text
'Palmerston Substation' and private access road. 4554 Poatina Rd, Cressy TAS 7302	6753097	142369/1, 142369/2 & 142369/3	No

1.5 Planning Summary

The Development Application is for the use and development for Utilities. Withing the Planning Scheme, 'Utilities' is defined as '*The use of land for utilities and infrastructure' including:*

- *(c) transmitting or distributing gas, oil or electricity*

The BESS is located within the Agriculture Zone under Clause 21.0 to the Planning Scheme, with underground transmission connection into Palmerston Substation (and necessary substation expansion) entering the Utilities Zone (Clause 26.0). The Proposal's permit approval does not require any rezoning.

The Development Area is subject to multiple mapped overlays, including:

- Electricity transmission infrastructure protection Code (Substation facility buffer area, Substation facility, Electricity transmission corridor and Inner protection area)
- Natural Assets Code (Waterway and coastal protection area),
- Safeguarding of Airports Code (Airport obstacle limitation area), and
- Bushfire-prone Area code.

Chapter 7 provides a comprehensive assessment against the planning provisions and includes maps detailing the abovementioned zones and overlays. Nearby mapped overlays that do not intersect with the Development Area include Scenic Protection Code (scenic road corridor), Landslip Hazard, and Local Historical Heritage Code (Local heritage place).

The following Development Application triggers apply to the Proposal, with reliance upon some Performance Criteria among the Use and Development Standards:

- General Provisions Clause 7.5.1(a): change of use where the change of use is to a discretionary use
- Clause 21.2 Use Table: Discretionary Use Class (Agriculture Zone), relies upon some Performance Criteria
- Clause 26.2 Use Table: Permitted Use Class (Utilities Zone – Palmerston Substation), relies upon some Performance Criteria
- Clause C2.0 Parking and Sustainable Transport Code, relies upon some Performance Criteria
- Clause C3.0 Road and Railway Assets Code, relies upon some Performance Criteria
- Clause C4.0 Electricity transmission infrastructure protection, relies upon some Performance Criteria
- Clause 7.0 Natural assets (Waterway and coastal protection area only), relies upon some Performance Criteria

All components of the Proposal, including invertors, access roads, and all other infrastructure directly related or subservient to the BESS fall under the Use Class 'Utilities'.

2. Site & Context Analysis

2.1 Site Analysis

2.1.1 Overview

The Development Area is a small, approximately 1.5 ha footprint within a pocket of a much larger freehold parcel. The Site (the parcels that contain development) comprises a 247 ha farming property and the Palmerston Substation. The farming parcel includes a dwelling, farm sheds, and other productive farm infrastructure such as pivot irrigation. This parcel spans across Poatina Road and the Palmerston Substation access road. Due to the need for transmission connection, an underground cable connects the BESS into the Palmerston Substation, meaning the substation land also forms part of the Site.

For the purposes of the site analysis, the focus is on the Development Area, approximately 1.5 ha of cleared and highly modified agricultural land that has been leased by the Proponent for the purposes of the Proposal.

The Development Area (Figure 2) comprises the unwatered corner of a centre pivot-irrigated square paddock. Its strategic location outside of the pivot radius means its use as a BESS would not reduce the land's agricultural productivity nor diminish the stock of watered land. The siting enables a small buffer to the pivot circle.

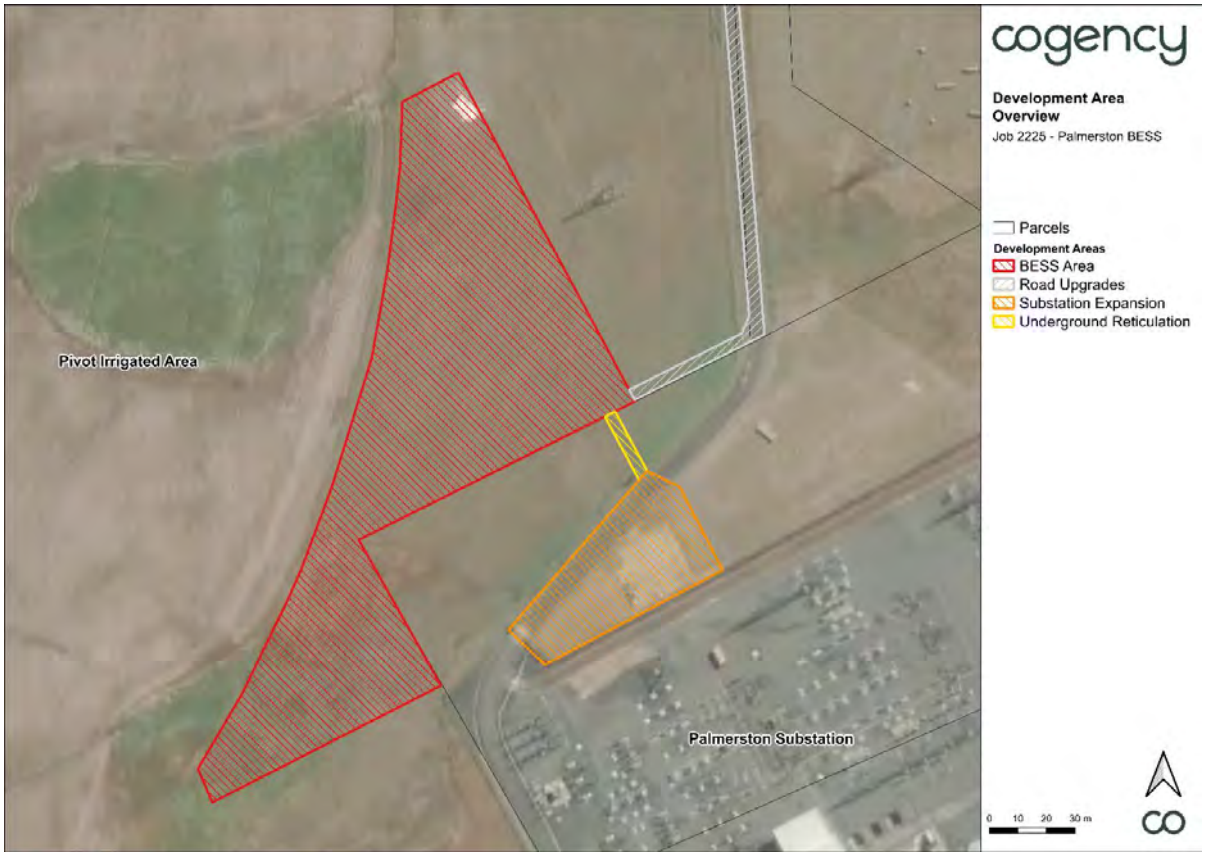


Figure 2 Development Area

2.1.2 Environmental and Physical Conditions

The physical conditions of the Development Area present an ideal location for a BESS and associated infrastructure. The land is relatively flat and has no native or mature vegetation. The area of the Site selected for the Development Area is low productive agricultural land and has low ecological value.

The physical environment is consistent across the Site, dominated by agricultural uses including grazing, irrigation and cropping. The Site has experienced significant land disturbance due to the long history of farming in the local area. No waterways intersect the Development Area; however, Woodside Rivulet and Palmers Rivulet cross within the south of the Site. Both of these rivulets have no defined bed and bank, and appear as shallow drainage lines.

As outlined in the Traffic Impact Assessment (Pitt & Sherry, Appendix E), the primary access to the Development Area is via the private Palmerston Substation Road, from Poatina Road. The Development Area is towards the southern extent of the access road. The road is formed crowned asphalt with drainage ditches and guideposts on both sides. The Proposal will require some upgrades to this road and a new access point.

2.2 Context Analysis

2.2.1 Indigenous History

The Development Area is located along the northeastern boundary of the Big River Nation territory, very close to the boundary with the Northern Midlands Nation. The territory of the Big River Nation ran from approximately New Norfolk through to the southwest corner of Surrey Hills to Quamby Bluff in the west and along the Western Tiers through to St Peters Pass and eventually linking up at Herdsman's Cove. The clan most likely to have occupied the area around Poatina/Cressy (including the Site) was the Luggermairrernerpairrer (See Figure 4 within Appendix D).

The Big River Nation was comprised of at least five clans. These were the Leenowwenne who were located around New Norfolk, the Pangerninghe located around the Clyde-Derwent junction between the Ouse and Dee Rivers, and the Braylwunyer (located around the area as the Pangerninghe). The remaining clans were the Larmairremener who were located west of the River Dee and the Luggermairrernerpairrer who were located at the Great Lake.

Chapter 8.2 summarises the supporting Aboriginal Cultural Heritage Assessment. Notably. the design avoids disturbing artefact sites discovered through that assessment.

2.2.2 Council Area

The Proposal is located within the Northern Midlands Council area. The Council is classified as 'rural, agricultural, and very large' (RAV) in the Australian Classification of Local Governments. The Council area is in Tasmania's northeast, landlocked, and supports a population of 13,400. European settlement in the Council Area occurred in the early 1800s. Since then, the main land uses have been wool growing and cropping (particularly cereals, poppies and potatoes).

The majority of land is therefore put to an agricultural use. Because of its distance from coastlines, Northern Midlands experiences Tasmania's warmest summers and coldest winters, and is the driest area in Tasmania. The region receives between an average of approximately 600 mm rainfall per year.

Northern Midlands' major transport services are the Esk Highway, Midland Highway and Launceston Airport. The Site is 50 km southwest of Launceston. Figure 3 shows the location of the Site within the Northern Midlands.

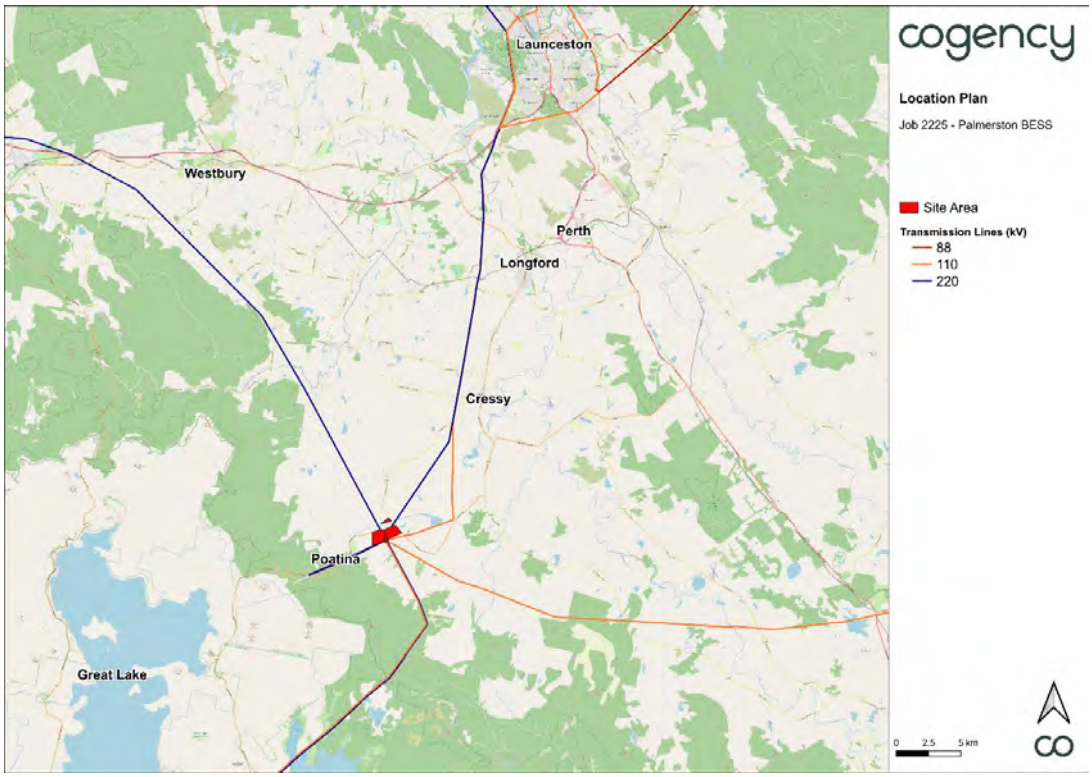


Figure 3 Location Plan

2.2.3 Nearby Localities

The Proposal is located at the eastern edge of the Poatina locality, where it borders with Cressy locality. The Palmerston Substation is also within the locality of Poatina. Poatina is the nearest significant township and is 2.3 km west of the Proposal. Poatina is 40 km south of Launceston and has a population of approximately 118. Poatina's urban form is consistent with the postwar commuter towns that typify the Council area's north. The town is located at the western edge of a valley, at the foothills of the Great Western Tiers, which form a significant skyline backdrop in the area. Developments outside of these townships are typically farmsteads and agricultural buildings suggestive of the Northern Midlands' early colonial settlers.

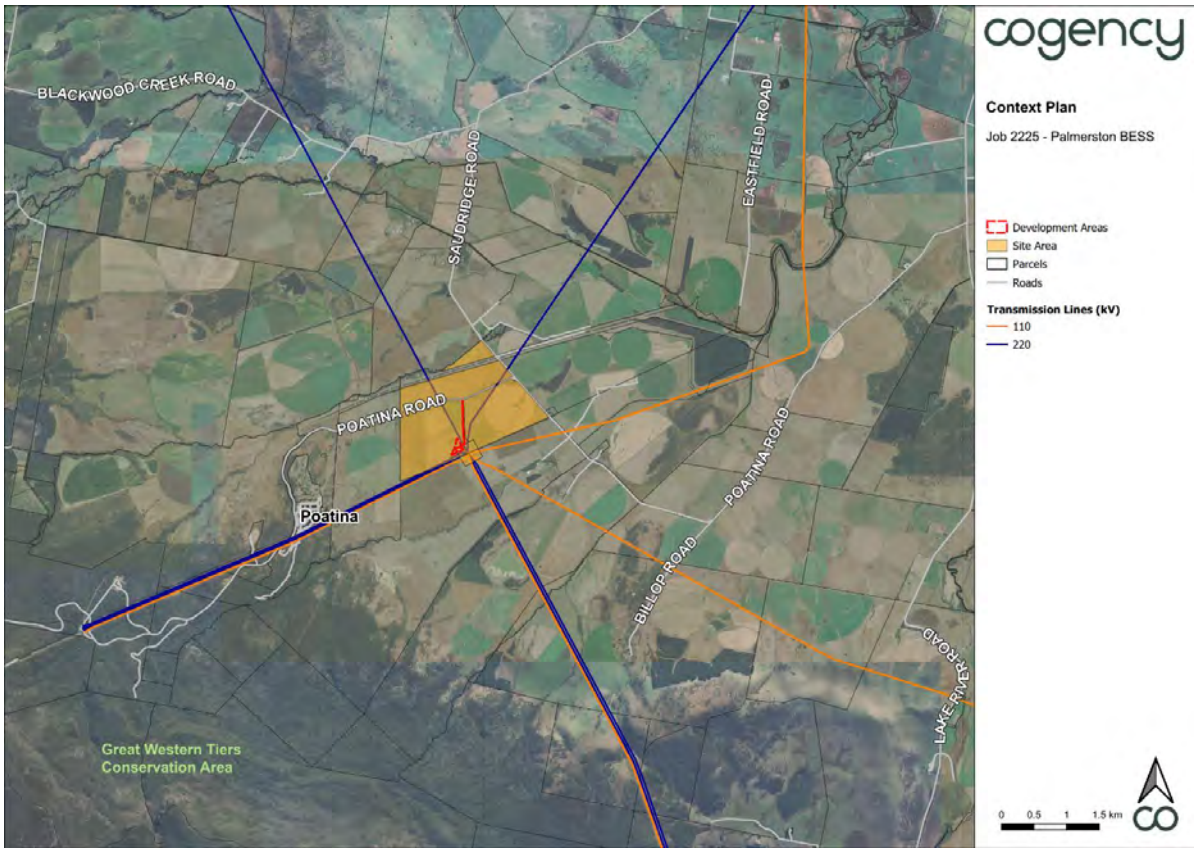


Figure 4 Context Plan

2.2.4 Surrounding Land Uses

The land surrounding the Development Area and Site is highly modified and used intensively for agricultural purposes. The Site is located well outside of urban settlement areas, with the nearest towns being: Poatina, 2.3 km west; Cressy, 12.5 km northeast; and Bracknell, 15 km northwest. There are several residential dwellings on large farming properties near the Site.

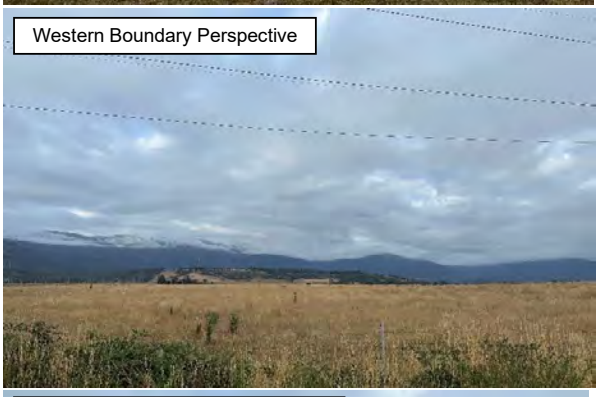
Within a defined survey area of 2.5 km of the BESS there are approximately 31 dwellings. Of those 31 dwellings, only 6 are within 1.5km of the BESS. The nearest dwelling is approximately 750 m southeast of the Development Area. The existing Palmerston Substation is directly in between this dwelling's line of sight to the Proposal. This represents a low density of dwellings in the immediate vicinity compared to other areas of Northern Midlands.

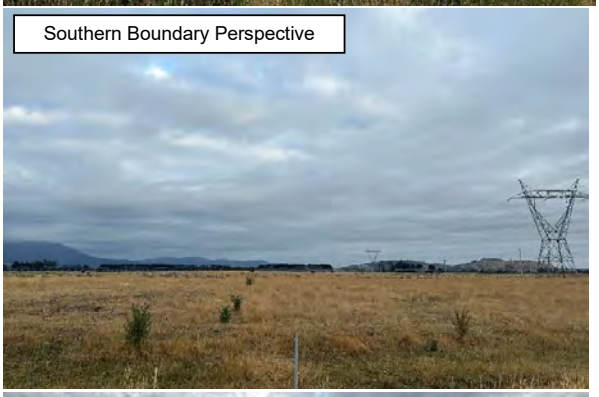
The Proposal is adjacent to the Palmerston Substation, which is a key part of Tasmania's 220 kV north-south transmission system. The fenced substation footprint occupies approximately 5.3 ha of a 9.3 ha landholding designated for the substation, comprising two land parcels.

Key roads in the vicinity of the Site are Poatina Road and Saundridge Road. Poatina Road is a double-width asphalt road with a raised roadbed that connects Poatina with Cressy. Saundridge Road is a single-width paved road that provides an alternate route from Poatina to Cressy.

2.3 Site Photos

The following set of photos describe key elements of the Site and Development Area.





3. The Proposal

3.1 Overview and Masterplan

The Proposal is for a Battery Energy Storage System (BESS), which is an energy storage device. It allows the storage of electrical energy when there is high production and low demand, and the discharge of electrical energy when there is low production and high demand. This is useful for stabilising the flow of intermittent renewable energy supply into an electricity grid, particularly solar and wind.

The Concept Masterplan (Figure 5) broadly defines where the main BESS elements are located, within a secure perimeter-fenced compound. The underground transmission cable connects directly to Palmerston Substation. Access will be created from the existing substation access road, with two connections to support improved emergency access. An extension to the substation facility area will be required to accommodate the connection.

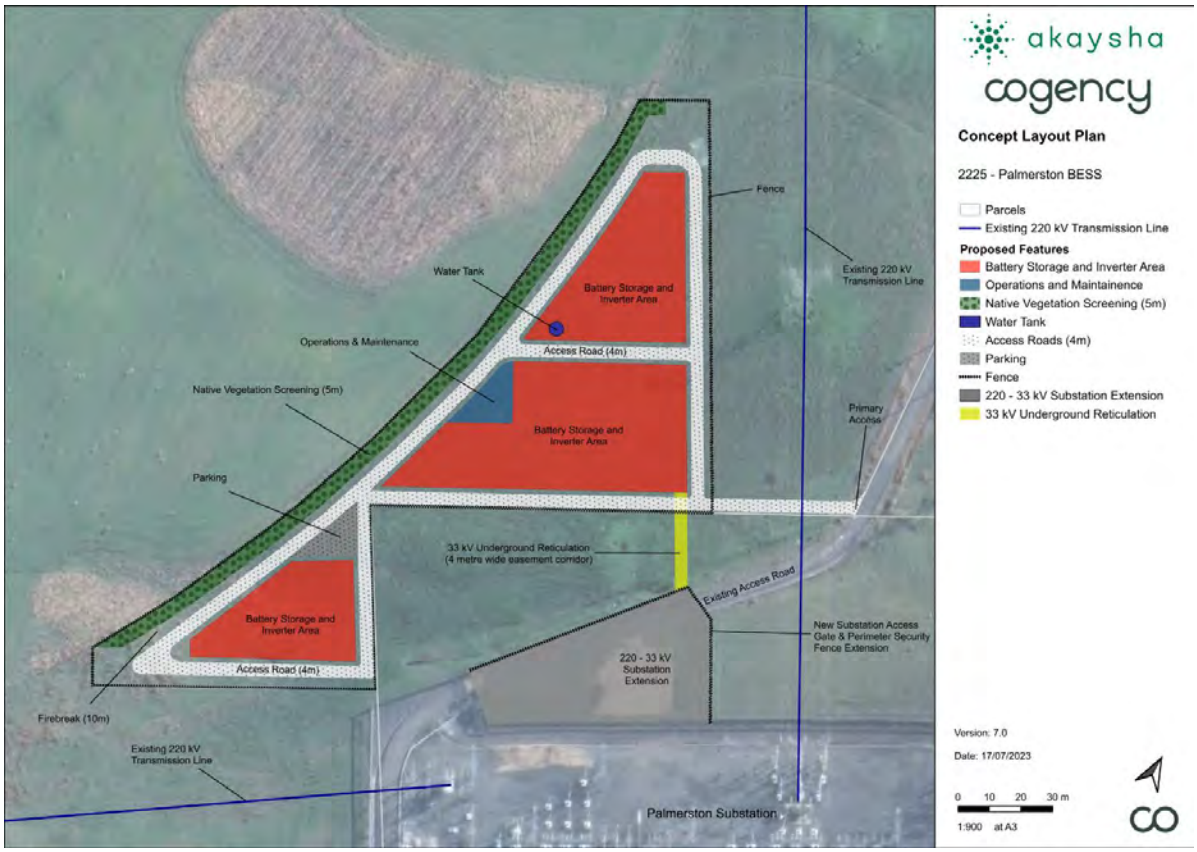


Figure 5 Concept Layout Plan

3.1.1 Design Iterations

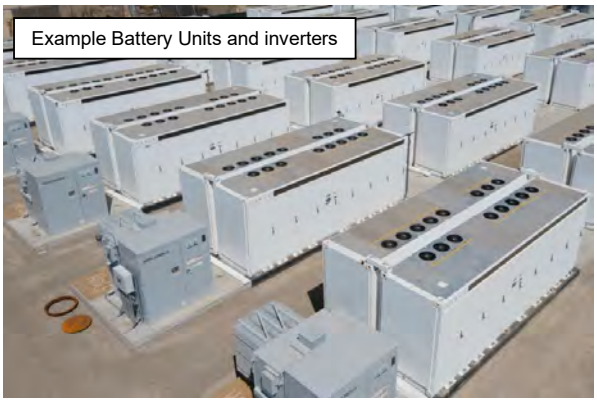
The Proposal has undergone a range of design iterations to reflect more detailed understanding of the site, and to reflect constraints. This includes firstly avoiding the path of the pivot irrigation to the west, and the most valuable agriculture land. It also includes a relocated access path to maximise the potential of the Tasnetworks land, and a new location for the transmission line connection to best position the approach to the existing substation. Further, it includes shifting the BESS slightly to the east to allow adequate space for native vegetation screening along the western boundary, the side with the highest visual potential.

3.2 Infrastructure Detail

Table 2 Summary of Proposed Infrastructure Elements

Infrastructure	Details
Batteries	The proposed BESS comprises advanced lithium-ion battery modules connected in series. The proposed energy storage product (battery) is the 2022 Tesla Megapack. A single Megapack unit is a containerised 3 MWh battery system, with integrated modules, inverters and thermal control systems.
Inverters and Transformers	An inverter is needed to convert the battery terminals' DC voltage into an AC voltage, suitable for transmission. The proposed 2022 Tesla Megapacks include bidirectional inverters.
Reticulation to Palmerston Substation	The BESS will be connected directly to the Palmerston Substation using an underground, 33 kV reticulation. The reticulation will be insulated from any other power lines in order and be routed from the BESS to the substation's 33 kV switchgear. The switchgear can then control the flow of electricity from the BESS to the substation, allowing for it to be used in the local network.
Cabling and Trenches	The batteries will be connected using trenched underground cabling.
Site Access and Access Roads	Access to the Development Area will be provided from the Palmerston Substation Access Road – a dedicated private access road from Poatina Road.
Fencing	The Proposal will be surrounded using ~3m high black-coated, chain-mesh fence, punctuated by gates as needed.
Hard standing	The main infrastructure components will require concrete hardstands, that will be surrounded by gravel surfacing.
Culverts and Drainage Infrastructure	To minimise the impact on the minor tributary through the Site, the Proposal will manage stormwater runoff and waterflows, so that the flow direction and capacity is maintained.
Buildings	A small site office to accommodate on site workers, along with maintenance and operations sheds, will be included, clad in non reflective materials and visually recessive colors.

The images within Figure **6** illustrate examples of typical infrastructure components. These components are subject to detailed design and purchasing, but form broad representations of key components.



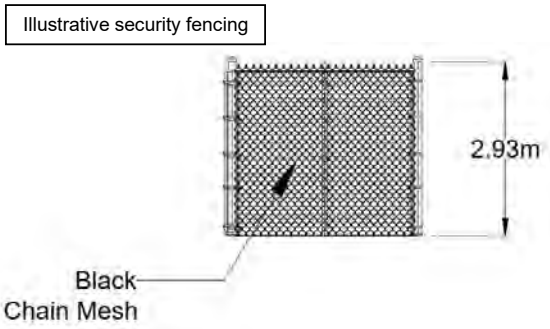


Figure 6 **Example images of proposed infrastructure**

3.3 Landscape and Vegetation

The proposal includes the establishment of landscape screening to reduce the visual appearance of the facility from surrounding land, including Poatina, and from public views along Poatina Road. This 5m wide screening will also help to reduce noise spill and provide habitat.

Potential screening opportunities are detailed in the Land Visual Impact Assessment (Appendix F) and will be further refined during the detailed design phase.

3.4 Decommissioning

At the end of the BESS's lifespan, the Project will either be refurbished or decommissioned. The decommissioning option would return the site to a practically pre-works state, with all infrastructure removed to a depth of 80 cm. Following decommissioning, the land would be capable of returning to an agricultural use. Decommissioning would involve additional workers and disturbances, though to a lesser extent than construction. The typical lifespan of a BESS is 20 years.

4. Proposal Justification

4.1 Purpose and Benefits

The main purpose of the proposed BESS is summarised in Figure 7 below:

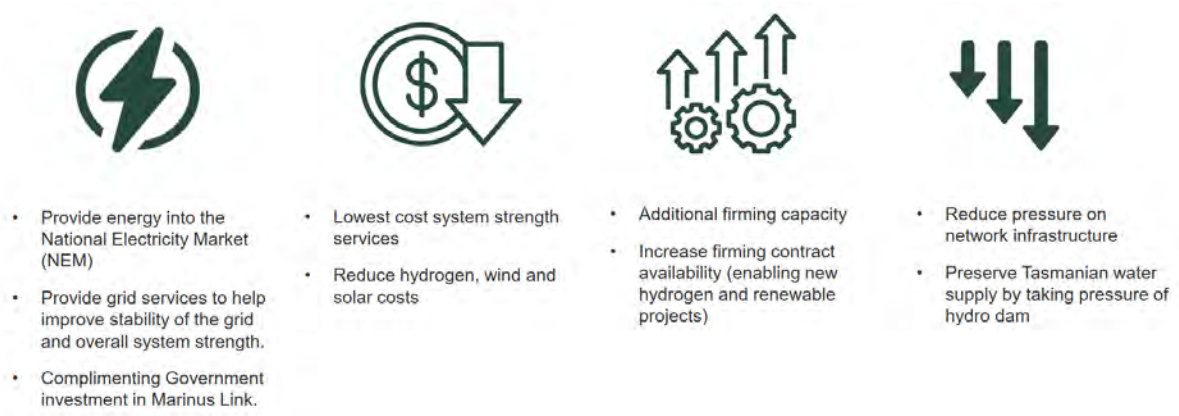


Figure 7 Key benefits of the Palmerston BESS

Technical performance and benefits are detailed in the following sub-sections.

4.1.1 Virtual Synchronous Machine (VSM) stability and reliability

The Proposal will provide Virtual Synchronous Machine (VSM) services to the Tasmanian electricity network. VSM is control strategy that allows battery systems to mimic the function of a synchronous generator, and thereby provide the same stability benefits to the grid.

A synchronous generator is a type of machine that converts mechanical energy into electrical energy. It is useful because its output can be finely tuned and rapidly adjusted. In this way, the role of a synchronous generator in a grid – or, in this case, a VSM – is to provide a stable and reliable source of electrical power, that can be quickly ramped up or down to compensate for changes in generation or load. This is particularly helpful when there is a high penetration of grid-connected renewable energy generators, as their outputs are unavoidably subject to unforeseeable and uncontrollable fluctuations.

The use of a VSM-configured BESS supports the continued integration renewable energy sources into the Tasmanian grid, while also providing a range of other benefits, such as outlined below.

4.1.2 Frequency Control and Inertia Support

Frequency control refers to the ability of a BESS to maintain the stable frequency of electricity in a grid. In normal Tasmanian power systems, the frequency of the electricity is carefully controlled to ensure that it stays within a certain range.

The proposed BESS can be used to help maintain this frequency, by storing excess energy when the frequency is higher than desired, and then releasing that energy back into the grid when the frequency is too low. This helps to maintain a stable and reliable power supply, and can support lower electricity costs. These benefits are also reasons why the AEMO have identified the increased provision of frequency control assets as a key objective[1].

[1] https://www.aemc.gov.au/faster-frequency-response-support-future-security-power-system

4.1.3 Energy Arbitrage

Another benefit to the community posed by the Proposal is its ability to undertake energy arbitrage. This involves buying and selling electricity at different times in order to take advantage of price differentiations in the electricity market. This can help to balance the grid, reduce system costs, and provide stability and reliability to the local energy market.

More significantly, this can help to reduce the cost of electricity for consumers, as well as provide a source of revenue for businesses. Additionally, energy arbitrage can help to reduce carbon emissions, as it reduces the need for additional power plants to be built in order to meet peak demand.

4.1.4 Black Start Support

A black start refers to the process of restarting a power plant, usually after a blackout. In the context of a BESS, a black start is the process of using a battery system to power the initial start-up of a power plant. Power plants rely on the grid to provide energy for their initial start-up, so this can be useful in situations where the grid is not available, such as after a natural disaster or other catastrophic event.

One common method is to use the battery system to provide power to the initial start-up equipment for a power plant, such as the motors that drive the generators. Another approach is to use the battery system to power the control systems of a power plant, which are responsible for coordinating the start-up process. In either case, using a BESS for the black start process, a power plant can be quickly brought back online, restoring power to the affected area.

4.2 Site Suitability

The Development Area is suitable for the use and development of a BESS and associated infrastructure, noting it is:

- The unwatered corner segment of a square agricultural paddock irrigated using a centre pivot. This is an innovative use of underutilised agricultural land and will not impact the agricultural productivity of the Site
- Absent any areas of ecological value
- Relatively flat topography, requiring minimal changes to the natural landscape
- Situated kilometres from settlements (Poatina and Cressy) and well-distanced from sensitive receptors
- Adjacent to the Palmerston substation, avoiding the need for lengthy transmission
- Located nearby to existing and planned renewable energy resources, including a proposed REZ. This means it is well-placed to support the electricity grid during times when these resources are subject to uncontrolled intermittencies
- Easily accessible via Poatina Road and the TasNetworks private Palmerston Substation access road
- Located on land that has already experienced significant disturbances and modifications from historic agricultural activities
- Zoned appropriately for the Utilities use, with no other major constraints or contradicting planning controls.

4.3 Employment Generation

The development of the Proposal can benefit the local economy by creating jobs, particularly during the construction phase. The construction of a BESS requires a large number of skilled workers, including electricians, engineers, technicians, project managers and labourers. The construction will also require materials that can be manufactured in Tasmania, including concrete, steel and fencing.

The number of jobs to be generated during construction is likely to be around 75-100 FTE. The operation phase is expected to require 5-10 FTE ongoing.

5. Community and Stakeholder Engagement

The Proponent is committed to meaningful consultation to generate feedback and ensure that any affected residents are appropriately informed. The following principles have been adopted to guide the preparation of the community and stakeholder engagement process for the Proposal and are based on best-practice renewable energy development guidelines from across Australia, and the IAP2 Spectrum for Public Participation 2018. These guidelines have been tailored to respond to the particulars of this project, in particular its small scale and the fact that it is adjacent to an ongoing and established electrical utility in the area.

As part of the early engagement process, discussions have already been held with the Northern Midlands Council, as well as Renewables, Climate and Future Industries Tasmania (ReCFIT). In addition, a public information session was held on 23 September 2022, and a second information session is planned for later in 2023. Door knocking of all nearby dwellings was carried out in January 2023. Further engagement will occur through the development application process, as well as before and during construction.

5.1 Engagement Plan & Principles

Cogency, on behalf of the Proponent, has prepared an Engagement Plan and will ensure that all engagement includes information that is clear, honest and available about:

- The Proposal's details, including impacts, timelines and construction process
- Why the Proposal is important to Tasmania's continued economic development
- The Proposal's benefits, including jobs creation, contribution to mitigating climate change, and grid support
- The potential negative impacts caused by the Proposal and the planned mitigation measures.

As part of the engagement process, targeted door knocking will begin with dwellings in the immediate project area. This will present an opportunity for the limited number of directly affected locals and other interested stakeholders to gain further details on how the Proposal may affect them. A second community information session is also planned for later in 2023. The overall key message for the Proposal will be:

The engagement strategy for the Proposal adopts the following principles:

Mutual Benefit and Respect

Deliver shared outcomes of mutual benefit in an equitable way for the local host community, landowners, and developer. Provide a space for genuine dialogue for respectful discussions that identify mutually agreeable solutions.

Relationship Building

Build genuine local relationships, networks and links to key local leaders or organisations. Allow key stakeholders to become project advocates and create feedback loops. Help the local community to identify positively with the project and integrate it into their sense of community and place.

Authenticity

Have a strong, authentic, and local presence in the community by providing dedicated staff who are reliably and readily available as the community's trusted 'translator' of technical knowledge, to explain information to the community and stakeholders in a simple yet effective way to address any misinformation.

Transparency, Trust and Accountability

Provide diverse and ongoing opportunities for engagement throughout the Proposal's lifecycle. Monitor and evaluate the community engagement, benefit sharing and social impact management programs to identify areas for improvement and/or modification.

Ongoing Engagement

Listen and respond to community needs and concerns in a comprehensive and timely manner. Maintain a record of the key issues raised and/or complaints received to date and how they were resolved.

Responsiveness

Listen and respond to community needs and concerns in a comprehensive and timely manner. Maintain a record of the key issues raised and/or complaints received to date and how they were resolved.

Social Feasibility

Understand, minimise and offset the risk of negative social impacts across the Proposal's lifecycle by taking into consideration the many social factors through the use of appropriate social analysis tools and integrating them, alongside the technical and economic factors, into the Proposal.

Fairness

Ensure that consultation is two-way and that opportunities exist for local community members and other stakeholders to participate, with access to balanced information, and having their ideas justly considered, responded to, and incorporated where possible.

Inclusiveness

Identify a wide range of different stakeholders across the local and regional communities and ensure that the channels and methods of engagement are tailored to the needs of each stakeholder group so that they are engaged with appropriately and effectively.

5.2 Stakeholder Briefings and Meetings

5.2.1 Meetings with Northern Midlands Council

17 November 2022

The project team met with Council's Senior Planner and planning staff on 17 November 2022 at Council offices in Longford. The Proponent also had communication with Council prior to this meeting.

The purpose of the meeting was to introduce the Proposal to Council, and gain feedback. The project team also shared the outcomes and responses from the community in regard to the 23 September 2022 community information session.

Council raised a number of issues and points to address in the Planning Application, including relating to the Proposal's potential bushfire risk.

07 August 2023

The project team attended a Councillor Workshop on 07 August 2023, providing an up to date presentation on the Proposal, benefits, and supporting reports. The purpose of the meeting was to brief Councillors and discuss and hear questions. Some questions were posed on appearance, employment opportunities and bushfire risk.

5.2.2 Meetings with ReCFIT

17 November 2022

Cogency met with two staff from Renewables, Climate and Future Industries Tasmania (ReCFIT) on 17 November 2022 at the Department of State Growth Offices, Salamanca Place, Hobart. The purpose of the meeting was to provide a high-level introduction of the Proposal to ReCFIT.

07 August 2023

The project team met with two staff from ReCFIT in Hobart. The purpose of the meeting was to provide an update on the Proposal and discuss potential benefits to the State, prior to lodgement. The benefits of the proposed battery for the grid were discussed, as well as future community engagement activities.

5.2.3 Engagement with TasNetworks

The Proponent and Project team engaged with TasNetworks on a number of occasions in 2022 and 2023 to discuss grid connection and transmission options for the Proposal, in addition to matter relating to TasNetworks land holdings, Initial engagements set the parameters for key technical aspects of grid connection and use of land that would be required.

5.2.4 Summary of Issues Raised

The key issues raised during engagement with key stakeholders were mainly concerned with the potential impacts of fire risk and noise generation of the BESS. Based on the location of the proposed use and development being within a Bushfire-prone area, mitigating fire hazards and risks is of critical importance. Noise generated from the construction and operation of the BESS is often a potential issue, mitigated in this case given the closest dwelling is approximately 770m from the Site. Further issues raised were visual impact, need, hydrology, loss of agricultural land and flora and fauna impacts.

Identifying these key issues in earlier stages of engagement ensured the appropriate technical assessments and mitigation measures were prepared to support the Development Application.

5.2.5 Communication Materials

Communication materials were prepared to provide information and raise awareness about the Proposal. Factsheets were created based on relevant themes and concerns that were raised in briefing and meetings in earlier stages of stakeholder engagement. The factsheets outlined technical aspects of the BESS, general proposal information as well as key benefits and design considerations. These were distributed by the community engagement team during the doorknocks.

To inform the community of the Proposal team's presence in the local area, letters in advance were distributed prior to the doorknock, as well as thank you letters after the engagement activity took place. Further communications materials will be prepare to accompany additional consultation events.

5.2.6 Community Consultation Event

The Proponent held a community information day on 23 September 2022 at the Poatina Chalet, 65 Gordon Street, Poatina between 10am-1pm. In total, 10 people attended. The Proponent's team were present to greet people and provide information about the Proposal and answer questions.

The purpose of the community information day was to introduce the Proposal to interested parties and community members, provide proposal information, as well as provide opportunities for community members to ask questions and give feedback.

Generally, the attendees were positive about the Proposal. Many attendees were interested to learn more about the technical aspects and benefits of the BESS. All community feedback was recorded, with topical issues addressed and communicated by the Proponent's team.

5.2.7 Door Knocking

Properties within 2.5km of the Proposal were door knocked on January 30, 2023. The purpose of the door knock was to provide a direct point of contact to the community in closest proximity to the Proposal, to hear any concerns, provide information and encourage engagement.

In total, there were approximately 31 houses door knocked and of this total, 17 residents were home. Houses with locked gates, houses with guard dogs or farms with biosecurity signs out the front were not door knocked. For residents that weren't home, a factsheet was left with a note with contact details.

5.2.8 Post lodgement

Post lodgement community engagement will commence after the Development Application has been lodged. While the Proposal is undergoing assessment for statutory approval, the Proponent's team will continue to engage the local community and other key stakeholders. This is to ensure the community understands the opportunities for formal public input on the Proposal as it is assessed, as well as to provide key updates related to the Proposal.

The post-lodgement engagement stage will likely include the following activities:

- Second community information day
- Provision of updated fact sheets
- Council Officer and Councillor Briefings
- Meetings as requested to inform, consult or involve the interested or concerned local community and stakeholder groups.

During this stage, the Proponent will remain committed to proactive and meaningful engagement with the community and stakeholders.

6. Legislation, Guidelines and Policy

6.1 Policy and Strategic Summary and Alignment

Table 3 outlines the federal, state, regional and local polices, legislation and plans that are relevant to the Proposal, including alignment with the relevant provisions.

Table 3 Relevant policies

Policy & Strategic Summary & Alignment		
Commonwealth	**Relevant Objectives & Actions**	**Project alignment**
Paris Climate Agreement 2016	▪ Strengthen the global response to the threat of climate change. ▪ Maintain global average temperature to well below 2°C above pre-industrial levels and pursue efforts to limit temperature increase to 1.5°C". ▪ Achieve net zero emissions by 2050, and inscribe low emissions technology stretch goals.	▪ The Proposal will support the ongoing development of renewable energy generators in Tasmania, and by extension contribute to Australia's commitment to the Paris Climate Agreement. ▪ The proposal is also consistent with recent Commonwealth announcements regarding long-term emissions reduction.
Climate Change Act 2022	▪ Advance Australia's response to climate change. ▪ Promote accountability in governance and policy making in regard to climate change. ▪ Achieve Australia's greenhouse gas emissions reduction targets, per s 10 of the Act, at least 43% below 2005 levels by 2030, and net zero by 2050.	▪ The Proposal permits the ongoing development of renewable energy resources by allowing energy arbitrage and load deferral. ▪ These functions mean the Proposal will support renewable generation and benefit Australia's emissions reduction targets as set out in the Climate Change Act.
Australian Renewable Energy Target Scheme	▪ Reduce greenhouse gas emissions in electricity sector. ▪ Encourage generation of electricity form sustainable and renewable sources. ▪ Investment in new renewable energy projects until the target of 33,000 gigawatt-hours of renewable electricity generation is met and sustained until 2030.	▪ The Proposal will support the connection of additional renewable energy generators in Tasmania. These will directly support the Commonwealth in achieving its renewable energy targets.
AEMO Integrated System Plan 2022	▪ Support development of National Energy Market (NEM).	▪ The Proposal will connect to the NEM at Palmerston Substation. ▪ The BESS will contribute to grid stability and management.
Environmental Protection and Biodiversity Conservation Act 1999	▪ Environmental law that provides environmental protection in relation to Matters of National Environmental Significance (MNES). ▪ Ensures "that 'nationally significant' animals, plants, habitats, and places are identified, and any potential negative impacts on them are carefully considered before changes in land use or new developments are approved".	▪ A flora and fauna assessment was prepared in October 2022 (Appendix C). It included a review of existing information for the Site and surrounds using *TASVEG 4.0* and the Northern Midlands Interim Planning Scheme 2013, and an on-foot assessment was undertaken by an accredited botanist on 12 October. ▪ The on-foot review determined that vegetation was predominantly introduced pasture grasses, and that there were no areas of significant ecological value. These findings aligned with those of *TASVEG*. On the basis of this review, and the fact there are no other EPBC triggers, an EPBC Referral is unnecessary.
State	**Relevant Objectives & Actions**	**Project alignment**
Resource Management & Planning System (RMPS)	▪ Promote the sustainable development of natural and physical resources and the maintenance of ecological processes and genetic diversity. ▪ Provide for the fair, orderly and sustainable use and development of air, land, and water.	▪ The Proposal promotes the sustainable development vision of Tasmania through the provision of infrastructure that will support renewable energy generation. ▪ The proposal has been sited specifically to avoid environmental impacts and represents a significant economic investment in the region.

	▪ Encourage public involvement in resource management and planning ▪ Facilitate economic development in accordance with the objectives set out in the above paragraphs. ▪ Promote the sharing of responsibility for resource management and planning between the different spheres of government, the community and industry in the State.	
Land Use Planning & Approvals Act 1993 (LUPAA)	▪ Regulate the use and development of land, and some resources, within local government areas. ▪ Schedule 1 of the LUPAA sets out the objectives of the RMPS (Part 1) and Planning Process (Part 2).	▪ Pursuant to the LUPAA, and under the Planning Scheme, a permit will be required for the Proposal. ▪ The application for the Proposal will be made under Part 4, Division 2, section 57 of LUPAA. This is because the Proposal is a Discretionary use in the Planning Scheme.
Land Use Planning & Approvals Regulations 2014	▪ Prescribes notice requirements for certain exhibitions, approvals and application under the LUPAA. ▪ Prescribes fees payable under the LUPAA.	▪ The planning approvals process for the Proposal will adhere to the regulations outlined in *Land Use Planning & Approvals Regulations 2014* (Tas.).
Environmental Management and Pollution Control Act 1994 (EMPCA)	▪ Regulate activities that may cause environmental harm, and encourage environmental management by industry, planning authorities, and State agencies. ▪ Determines whether a development is considered a Level 1, 2 or 3 activity, based on the attributes of the project and their potential environmental impact. ▪ Activities not requiring EPA approval are still subject to the EMPCA, its regulations and policies. ▪ Level 1 activities are regular uses and developments which may have their approval covered by regular planning schemes. Their approval does not normally require EPA contribution, though may under a set of triggers outlined in Clauses 24 and 20.B. ▪ Level 2 activities are defined as those listed in Schedule 2 to the EMPCA and they require EPA referral for approval. ▪ Level 3 activities are the highest level. These have been designated 'State significant' under the *State Policies and Projects Act 1993* (Tas.).	▪ As the State has not yet considered a discrete BESS application, the EMPC Act and its supplementary guidelines does not specify whether a BESS of this size is a Level 1, 2 or 3 Activity, and it will therefore be necessary to determine this through discussions with Council and EPA. ▪ Considering that the proposal is for a low-impact BESS on a small area of land that is already disturbed by farming activities, with minimal environmental impacts, it is considered very unlikely that it would be considered a Level 2 or Level 3 Activity. ▪ Accordingly, the Proposal is being treated as a Level 1 Activity under EMPCA, with Northern Midlands Council as the Planning Authority.
State Policies and Projects Act 1993	▪ Encourage the development of State policies that achieve the objectives outlined in the RMPS. ▪ Provide for the determination and integrated assessment of projects of State Significance. ▪ Guide and outline requirements for State of the Environment Reporting. ▪ Seeks to further objectives of the RMPS.	▪ This planning approvals pathway has not been selected for the Proposal as it is not considered to qualify as a Project of State Significance under the LUPAA or this Act.
Building Act 2016	▪ Ensure that building, demolition and plumbing works meet, or exceeds minimum national construction standards. ▪ Ensure that any works related to building, plumbing and demolition do not negatively affect human health and safety. ▪ Provide creation of sustainable and environmentally efficient infrastructure.	▪ The development and construction of the Proposal will be conducted in accordance with the objectives and requirements of the Building Act 2016.
Aboriginal Heritage Act 1975 (AHAA)	▪ Protect and conserve relics (places, objects and sites) of Indigenous heritage.	▪ The siting and design of the Proposal has taken into consideration the findings of the Aboriginal Cultural Heritage Assessment (Appendix D). The Aboriginal sites

		discovered within the study area have been avoided for development. ▪ Therefore, the Proposal is not expected to impact upon existing Indigenous heritage values. ▪ Therefore, the Proposal aligns with the objectives and requirements of the AHAA.
Historic Cultural Heritage Act 1995 (HCHA)	▪ Protect and conserve places of cultural heritage significance in Tasmania. ▪ Seeks to further objectives of the RMPS.	▪ The Proposal's impact on existing cultural heritage values is expected to be negligible, in line with the Cultural Heritage Assessment undertaken for this Proposal. ▪ Therefore, the Proposal aligns with the objectives and requirements of the HCHA.
Major Infrastructure Development and Approvals Act 1999 (MIDAA)	▪ Make special provisions in relation to the approval of major infrastructure projects. ▪ Applies to projects having effects extending beyond single council area. ▪ Seeks to further objectives of the RMPS.	▪ This planning approvals pathway has not been selected for the Proposal as it is not considered to qualify as a Major Infrastructure Project under LUPAA / MIDAA given the Proposal's development footprint is small and within a single Council area.
Water Management Act 1999 (WMA)	▪ Promote the sustainable and fair use, management, and development of freshwater resources. ▪ Maintain ecological processes and diversity of aquatic and riparian ecosystems. ▪ Seeks to further objectives of the RMPS.	▪ The Proposal does not impact natural water processes or management. ▪ It is considered that the Proposal aligns with the objectives and requirements of the WMA.
Nature Conservation Act 2002 (NCAA)	▪ Conserve and protect fauna, flora and geological diversity of the State. ▪ Protect national parks and other reserved land for related purpose.	▪ The likelihood of impact on the quality of flora and fauna habitat of the Proposal is expected to be negligible. This has been confirmed through the Flora and Fauna assessment. ▪ Therefore, the Proposal aligns with the objectives of the NCAA.
Threatened Species Protection Act 1995	▪ Aim to protect threatened species in Tasmania.	▪ The Proposal has been sited and designed to ensure there is no impact on native vegetation or other listed matters.
Tasmania's Climate Change Act (2008)	▪ Aim to achieve net zero greenhouse gas emissions by 2030 and support measures to help the State adapt to climate change.	▪ The Proposal will help the state in achieving its emissions target through assisting the state in the storage of electricity from renewable energy.
Tasmanian Renewable Energy Target 2022 (TRET)	▪ Expand generation of renewable energy and increase network resilience capability. ▪ Aim to achieve 150% (15,750 GWh of electricity generated by NEM-connected equipment) by 2030 and 200% (21,100 GWh per the same conditions) by 2040.	▪ The Proposal will be a key contributor to the heightened TRET target and support Tasmania's transition to a major clean power exporter, by supporting intermittent renewable generation.
Tasmanian Renewable Energy Action Plan 2020	▪ Transform the State into a global renewable energy powerhouse. ▪ Improve energy security and lower energy prices through renewable energy generation. ▪ Growing the economy and creating jobs.	▪ The Proposal to use and develop a BESS is well aligned with the Action Plan's goals, would contribute to each of its priorities, and support its vision.
Regional	**Relevant Objectives & Actions**	**Project alignment**
Northern Tasmania Regional Land Use Strategy (2018) (NTRLUS)	▪ Enable and support opportunities for renewable energy generation.	▪ The NTRLUS supports the development of renewable energy assets in Northern Tasmania. ▪ The Proposal is consistent with the policies and strategies included in the NTRLUS.
Local	**Relevant Objectives & Actions**	**Project alignment**
Northern Midlands Strategic Plan 2021	▪ Develop Infrastructure that enhances capacity and economic sustainability of local area. ▪ Supports diverse, innovative, independent business and industry.	▪ The Proposal will create jobs and attract a new industry to the area. ▪ Its funding is completely external and complements existing public infrastructure.

		▪ The Proposal will contribute to local climate action goals by enabling the ongoing integration of renewable energy resources into the grid.
Fire Abatement Policy 2013 (2022 edition)	▪ The purpose of this policy is to minimise the risk of uncontrolled bushfires to the community. ▪ It requires that owners and occupiers of properties in rural areas responsibly 'manage their risk of fire transfer, either to or from their properties, through the use of fire breaks at their boundaries' (p 1). 'Depending on the slope and potential fuel load, fire breaks should be between 10 m and 20 m wide'.	▪ The Proposal has assessed bushfire risk as low, and addressed design measures to reduce risk, including provision of static water supply and other fire suppression measures. ▪ The compound footprint includes gravel access tracks, fire breaks and hardstand areas and will be closely managed to avoid vegetation regrowth.
On-Site Stormwater Detention Policy 2019	▪ This contains the enforceable safeguards established by Council to ensure 'that stormwater runoff generated by new developments' do not 'adversely impact downstream and surrounding properties for all storm events,' 'up to and including the 100-year Average Recurrence Interval event'. ▪ It includes design objectives and guidelines that relate to stormwater detention.	▪ The Site is not known as being flood prone. Stormwater infrastructure is proposed to manage runoff from the site in a responsible manner.

6.2 Renewable Energy Guidelines

6.2.1 Tasmanian Renewable Energy Coordination Framework 2022

The Tasmanian Renewable Energy Coordination Framework contains the specific directions for achieving the abovementioned REAP's goals and vision.

Action 6 – Establish Tasmania's First Renewable Energy Zone

The Proposal is closely aligned with Action 6 of the Framework's third 'pillar'. Action 6 refers to establishing Tasmania's first Renewable Energy Zone (REZ). The REZ program is administrated by AEMO, and is intended to reflect "*high-quality resource areas where clusters of large-scale renewable energy projects can be developed using economies of scale*"[2].

Indicative mapping shows Tasmania's midlands (in which the site is located – see Figure 8) are a candidate Renewable Energy Zone as identified by AEMO (see T3 Central Highlands in Figure 8 below).

The Framework further specifies that 'it is envisaged that there will need to be more than one REZ to deliver on all of the State's renewable energy objectives,' and that there will be a 'rolling approach to establishing additional REZ, dependent on variables like the commitment and construction of Marinus Link' and 'organic load growth in the State.'

[2] AEMO, "Appendix 3 to Draft 2022 ISP for the National Electricity Market", p. 5.

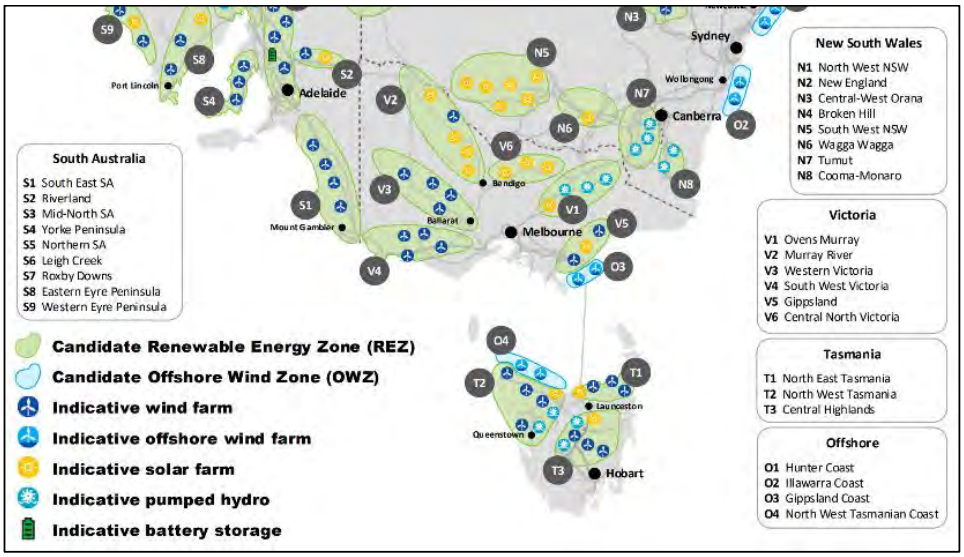


Figure 8 Candidate REZ Areas

Source (AEMO, Appendix 3 of the Draft 2022 ISP for the National Electricity Market, p. 7)

Action 9 – A Guideline to Community Engagement, Local Procurement and Benefit Sharing Practice

This Action relates to the relationship between genuine community engagement and successful project delivery. One of the goals is to implement "best-practice community engagement" standards[3]. The issuing of these guidelines occurred in 2022 and will be administered by a 'REZ Coordinator' (recently identified as RECFIT) who would facilitate broad-based community engagement on behalf of energy stakeholders in REZs.

Assessment

The Proposal will generate direct and indirect benefits for the regional and State economy. It will stimulate job creation through renewable energy investment and the development of a skilled workforce.

1.1.1 Draft Guideline for Community Engagement Benefit, Benefit Sharing and Local Procurement 2022

ReCFIT's *Guideline to Community Engagement, Local Procurement and Benefit Sharing Practice* purpose is to set standards for best practice community engagement, benefit sharing and local procurement for renewable energy development projects in Tasmania. Whilst it is specifically tailored to Tasmania, it reflects best practice standards from renewable energy development across Australia and the globe.

The Guidelines provide key principles to help facilitate appropriate and effective engagement with local communities. It outlines how local communities should best be consulted and involved in a project's lifecycle, how the benefits of developments should be shared to created lasting value in local communities and how to encourage and enable local communities to participate in providing services and skills to new developments.

Assessment

Community engagement activities have been guided by the principles of ReCFIT's Guidelines. This has enabled early, proactive, and meaningful engagement with the local community and ensured the benefits are tangible and valued. Chapter 5 details the community engagement program delivered for this Proposal.

[3]Renewable Energy Coordination Framework, p. 24.

7. Planning Assessment

7.1 Planning Scheme Overview

The Northern Midlands Council reformed its planning system in 2022. This change was made to harmonise it with the new, State-wide Tasmanian Planning Scheme (TPS). Each planning scheme under the TPS has two parts: (a) a set of consistent, State-wide planning rules called the State Planning Provisions (SPPs); and (b) a Local Provisions Schedules (LPSs). The local Council administers the Planning Scheme, determines the locations of zones and overlays implemented from the SPPs, and identifies special areas to be subject to additional, unique controls.

Under the Planning Scheme, the Proposal is located within both the Agriculture Zone and Utilities Zone (Clauses 21.0 and 26.0 respectively). It is also within mapped overlays of the Electricity Transmission Infrastructure Protection Code (Clause C4.0), Natural Assets Code (Clause C7.0), Bushfire Prone Areas Code (Clause C13.0) and Safeguarding of Airports Code (Clause C16.0). Under the provisions of the Scheme, the Proposal triggers the need for a Discretionary Development Application.

During the transition to the TPS, the Agriculture Zone has been applied to the land, while it was previously zoned as a Rural Resources Zone.

7.2 Planning Scheme Operation and Application

The purpose of the Planning Scheme is to control and coordinate use and development by applying planning controls to land. These controls are set out in Zones, Codes and General Provisions, and can become operative when a proposal exceeds certain use or built parameters or is located within a certain Zone or Code.

The Scheme includes 'Development Standards' (in Zones, Controls or General Provisions), utilising 'Acceptable Solution' and 'Performance Criteria' to manage use and development. The two are intended to work together. Some controls, however, include only one of either. The purpose of Acceptable Solutions is to act as suggested; frontline requirements that should be met where possible. The purpose of Performance Criteria, then, is to provide backup decision guidelines for the planning authority to consider if the Acceptable Solution is not met (or is not specified). Where there is only an Acceptable Solution, it is considered that it is a requirement, not an encouragement; where there are only Performance Criteria, it is considered that there are no specific requirements, and only decision guidelines.

7.3 Project definition

The Proposal is appropriately defined in the planning scheme as:

- *(Clause 6.0, Table 6.2)* ***Utilities****: use of land for utilities and infrastructure including:*
    - *(c) transmitting or distributing gas, oil or electricity*

While there are more specific definitions that describe some of the Proposal's components, all components are considered associated with/subservient to the primary component, being the BESS ('Utilities'), and therefore grouped under the primary use class (Clause 6.2).

Other definitions within the Planning Scheme that are relevant include:

- (C4.0, C4.3, 4.3.1) **Electricity transmission infrastructure**: means infrastructure for or associated with the transmission of electricity. It includes overhead lines, underground electricity and communication cables, substations, communications station, buildings, structures and access tracks for or associated with the transmission of electricity, and the like.
- (3.0, Table 3.1) **Road**: means land over which the general public has permanent right of passage, including the whole width between abutting property boundaries, all footpaths and the like, and all bridges over which such a road passes.

7.4 Summary of Permit requirements

The Proposal is primarily located within the Agriculture Zone under Clause 21.0 to the Planning Scheme and its permit approval does not require a rezoning. The following Development Application triggers apply to the Proposal , with reliance upon some Performance Criteria among the Use and Development Standards.

- General Provisions Clause 7.5.1(a): change of use where the change of use is to a discretionary use
- Clause 21.2 Use Table: Discretionary Use Class (Agriculture Zone), relies upon some Performance Criteria
- Clause 26.2 Use Table: Permitted Use Class (Utilities Zone – Palmerston Substation), relies upon some Performance Criteria
- Clause C2.0 Parking and Sustainable Transport Code, relies upon some Performance Criteria
- Clause C3.0 Road and Railway Assets Code, relies upon some Performance Criteria
- Clause C4.0 Electricity transmission infrastructure protection, relies upon some Performance Criteria
- Clause 7.0 Natural assets (Waterway and coastal protection area only), relies upon some Performance Criteria

The Proposal is also affected by a number of Codes, which act similarly to overlays and include further use and development controls. The Codes which affect the Proposal are listed elow.

7.5 Zones

As shown in Figure **9**, the Proposal is primarily sited within the Agriculture Zone, with the underground transmission connection to Palmerston Substation sited within the Utilities Zone. An assessment against these zones is provided further below.

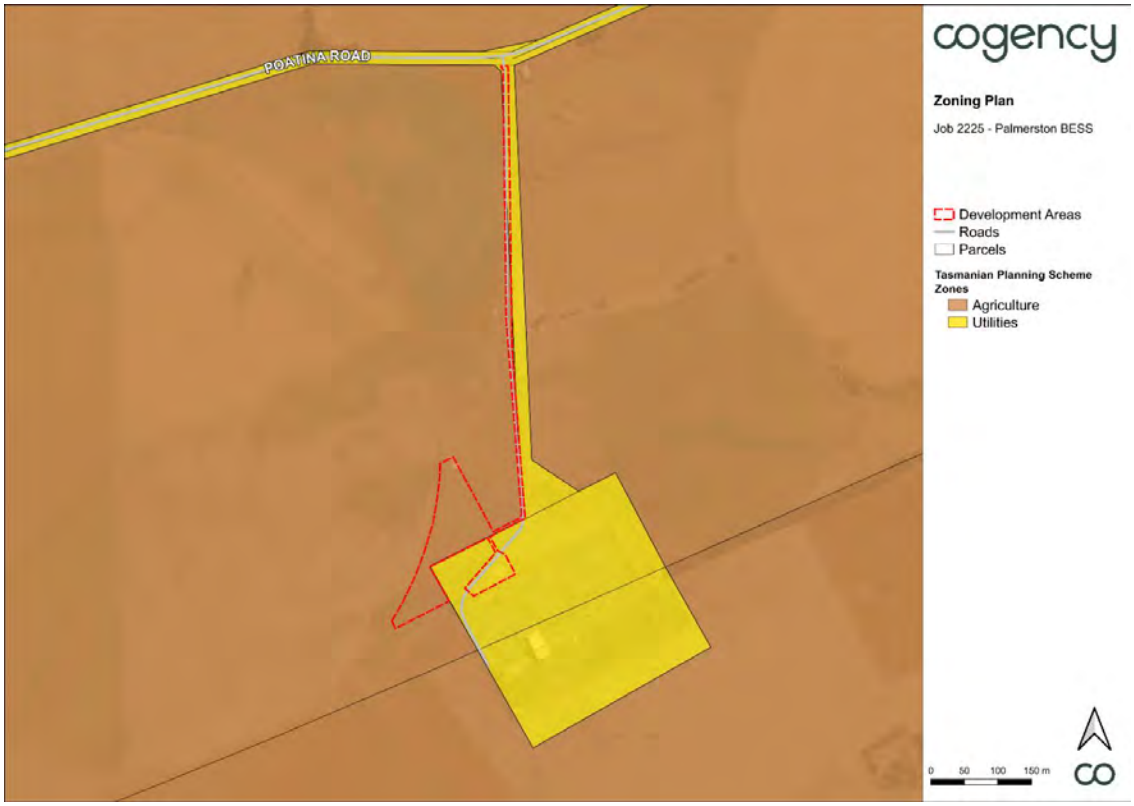


Figure 9 **Zoning Plan**

7.5.1 Clause 21.0 – Agriculture Zone

The purpose of the Agriculture Zone is:

- 21.1.1: To provide for the use or development of land for agricultural use.
- 21.1.2: To protect land for the use or development of agricultural use by minimising:
  - (a) conflict with or interference from non-agricultural uses;
  - (b) non-agricultural use or development that precludes the return of the land to agricultural use; and
  - (c) use of land for non-agricultural use in irrigation districts.
- 21.1.3: To provide for use or development that supports the use of the land for agricultural use

Under Clause 21.2 Use Table, the use class for Utilities is Discretionary, with no associated condition.

The following clauses are applicable to the Proposal, with assessment against each provided below:

- 21.3 Use Standards: 21.3.1 Discretionary uses
- 21.4 Development Standards for Buildings and Works (all standards)

Clause 21.5 Development Standards for Subdivision is not applicable as the Proposal does not include subdivision.

Table 4 Agriculture Zone – 21.1 Purpose

Purpose	Response
21.1.1: To provide for the use or development of land for agricultural use.	The Proposal supports agricultural use of the land, as it: ▪ Retains the existing centre-pivot irrigation; ▪ Diversifies the income stream for the retained agricultural business; and ▪ Is sited on lower-value residual land within the property, as well as having a minimal physical impact upon the property.
21.1.2: To protect land for the use or development of agricultural use by minimising: (a) conflict with or interference from non-agricultural uses; (b) non-agricultural use or development that precludes the return of the land to agricultural use; and (c) use of land for non-agricultural use in irrigation districts.	The Proposal does not create any land use conflict and will have no impact upon the existing agricultural use of the land.
21.1.3: To provide for use or development that supports the use of the land for agricultural use	As noted above, the Proposal supports the agricultural use of the land.

Table 5 Agriculture Zone – 21.3 Use Standards

21.3.1 Discretionary uses	
Objective: That uses listed as Discretionary: (a) support agricultural use; and (b) protect land for agricultural use by minimising the conversion of land to non-agricultural use.	
Acceptable Solution or Performance Criteria	**Assessment**
P1 A use listed as Discretionary, excluding Residential or Resource Development, must be required to locate on the site, for operational or security reasons or the need to contain or minimise impacts arising from the operation such as noise, dust, hours of operation or traffic movements, having regard to:	**Satisfies P1.** The Discretionary use for Utilities (f) supports diversification and value add of the existing agricultural property (d, e). In general, a BESS requires a relatively minor development footprint but needs to be sited close to substation and transmission infrastructure, often located within agricultural landscapes (c). In this Proposal's

(a) access to a specific naturally occurring resource on the site or on land in the vicinity of the site; (b) access to infrastructure only available on the site or on land in the vicinity of the site; (c) access to a product or material related to an agricultural use; (d) service or support for an agricultural use on the site or on land in the vicinity of the site; (e) the diversification or value adding of an agricultural use on the site or in the vicinity of the site; and (f) provision of essential Emergency Services or Utilities.	circumstance, the siting of the BESS is proximate to the necessary infrastructure (Palmerston Substation (a, b)). The Proposal will directly support the energy needs of Tasmania as well as providing economic diversity for the landowner.
P2 A use listed as Discretionary, excluding Residential, must minimise the conversion of agricultural land to non-agricultural use, having regard to: (a) the area of land being converted to non-agricultural use; (b) whether the use precludes the land from being returned to an agricultural use; (c) whether the use confines or restrains existing or potential agricultural use on the site or adjoining sites.	**Satisfies P2.** The Proposal requires only 1.5 hectares of land, which due to the nature of the Development Area is not well-utilised agricultural land, therefore negligible conversion away from agriculture (a). The proposal will not impact on surrounding agricultural operation (c), and can be fully decommissioned and returned to its former state if/when required (a).
P3 A use listed as Discretionary, excluding Residential, located on prime agricultural land must: (a) be for Extractive Industry, Resource Development or Utilities, provided that: (i) the area of land converted to the use is minimised; (ii) adverse impacts on the surrounding agricultural use are minimised; and (iii) the site is reasonably required for operational efficiency; or (b) be for a use that demonstrates a significant benefit to the region, having regard to the social, environmental and economic costs and benefits of the proposed use.	**Satisfies P3.** Both (a) and (b) are satisfied by the Proposal. As described above, the Utilities use (BESS) requires negligible reduction of agricultural land and does not impact surrounding uses. It will occupy the unwatered corner segment of a square lot irrigated using a centre pivot, and provides economic diversity to the existing farm landowner and is located adjacent to the necessary substation infrastructure. Furthermore, the Proposal will provide benefit to the region, in economic investment, diversification, energy security and construction jobs.
A4/P4 (Residential use) does not apply	**Satisfies P4** *(not applicable – not Residential)*.

Table 6 Agriculture Zone – 21.4 Development Standards for Buildings and Works

21.4.1 Building height	
Objective: To provide for a building height that: (a) is necessary for the operation of the use; and (b) minimises adverse impacts on adjoining properties.	
Acceptable Solution or Performance Criteria	**Assessment**
A1 Building height must be not more than 12m.	**Complies.** All buildings and structures, including the batteries, are well below 12m high, and the 33 kV transmission connection line is underground.
21.4.2 Setbacks	
Objective: That the siting of buildings minimises potential conflict with use on adjoining properties.	

P1 Buildings must be sited to provide adequate vehicle access and not cause an unreasonable impact on existing use on adjoining properties, having regard to: (a) the bulk and form of the building; (b) the nature of existing use on the adjoining properties; (c) separation from existing use on the adjoining properties; and (d) any buffers created by natural or other features.	**Satisfies P1.** The Proposal is sited adjacent to the boundary of the Site and Palmerston Substation. The nature of the substation (and its setback from the boundary) means there is no undue impact (b). The proposal is generally lower height and visual impact than the substation (a) and provides acceptable separation (c). Importantly, the Proposal is sited more than 500 m from a public road boundary and vegetation screening will be planted to reduce views to the proposal (d).
A2 Buildings for a sensitive use must have a setback from all boundaries of: (a) not less than 200m; or (b) if the setback of an existing building for a sensitive use on the site is within 200m of that boundary, not less than the existing building.	**Complies.** The proposal is not a sensitive use.
21.4.3 Access for new dwellings	
Does not apply (no dwelling proposed)	

The Proposal is a Discretionary use in the Agriculture Zone yet aligns with the zone purposes and clauses. Importantly, Clause 21.3.1.P1 requires that a Discretionary use must only be located in an Agriculture Zone if it is needed for access to existing infrastructure, or for the provision of essential utilities. The Proposal is intentionally located adjacent to the Palmerston Substation, a critical piece of infrastructure to connect to. The adjacency allows a short and low-impact 33 kV underground cable connection instead of lengthy overhead transmission. The Proposal is an essential utility that will support the strength and resilience of Tasmania's electricity grid.

7.5.2 Clause 26.0 – Utilities Zone

The Palmerston Substation is zoned Utilities, with the Proposal including underground transmission line connection to the substation and minor extension of the substation facility, including fencing (therefore, use and development of Utilities within the zone). The Proposal aligns with the zone purpose, is a Permitted Use Class, and has some relevant Use and Development Standards assessed below.

The following clauses do not apply:

- Clause 26.3.2, as the use class is not Discretionary.
- 26.4.3 Fencing, as no fencing is proposed within the Utilities zone.
- 26.4.4 Outdoor storage areas, as no outdoor storage areas are proposed within the Utilities zone.
- 26.5 Development Standards for Subdivision, as no subdivision is proposed.

Table 7 Utilities Zone – 26.1 Purpose

Purpose	Response
26.1.1: To provide land for major utilities installations and corridors.	The Proposal is for Utilities.
26.1.2: To provide for other compatible uses where they do not adversely impact on the utility.	Not applicable – the Proposal is for Utilities.

Table 8 Utilities Zone – 26.3 Use Standards

21.3.1 Discretionary uses
Objective: That uses do not cause an unreasonable loss of residential amenity to residential zones.

Acceptable Solution or Performance Criteria	Assessment
A1, A2 and A3.	**Complies with A1, A2 & A3 (not applicable).** These acceptable solutions apply to specific uses (excludes Utilities) only where a site is within 50 m of residential zones. The Palmerston Substation is completely surrounded by Agriculture Zone land and therefore the standards do not apply.

Table 9 Utilities Zone – 26.4 Development Standards for Buildings and Works

26.4.1 Building height	
Objective: That uses do not cause an unreasonable loss of residential amenity to residential zones.	
Acceptable Solution or Performance Criteria	**Assessment**
A1 Building height must be not more than: (a) 10m; or (b) 15m if for a structure, such as a tower, pole or similar.	**Complies (does not apply – no buildings proposed).** Within the Utilities Zone, only an underground cable is proposed.
A2	**Complies (does not apply – no buildings proposed and not within specified zones)**
26.4.2 Setbacks	
Objective: That building setbacks are: (a) compatible with the character of the surrounding area; and (b) does not cause an unreasonable loss of amenity to adjoining properties.	
Acceptable Solution or Performance Criteria	**Assessment**
A1	**Complies (does not apply – no buildings proposed)** Within the Utilities Zone, only an underground cable is proposed.
A2	**Complies (does not apply – not within 10m of residential zones)**

The proposed use is Utilities and is highly consistent with the Utilities Zone. The only component within the Utilities Zone is the underground transmission cable.