From: Cathy Ball <



Sent: Monday, 18 December 2023 2:16 AM

To: IPCN Enquiries Mailbox <ipcn@ipcn.nsw.gov.au>

Cc: cathy Ball <

Subject: Submission for SSD - 10315 Objection to Bowmans Creek wind farm

Thank you for this opportunity to have my say on the above matter. I would like to submit my submission by email. I object to the submission. Please contact me if you have any problems with upload to website.

Catherine Ball

Bowmans Creek NSW 2330

17th December 2023

Commissioner Chair Professor Alice Clarke Commissioner Adrian Pilton Commissioner Richard Pearson Office of the Independent Planning Commission NSW ipcn@ipcn.nsw.gov.au

Re: OBJECTION TO PROPOSED STATE SIGNIFICANT DEVELOPMENT (SSD) NO. 10315 – BOWMANS CREEK WIND FARM – Construction of up to 54 wind turbines 220m height

I would like to **object** to the proposed Application **No.SSD-10315** NSW Government, Major Projects, Department of Planning and Environment.

I am passionate about the environment and throughout my employment at National Parks and Wildlife NSW for 23 years as a Discovery Ranger I have presented, interpreted and delivered environment education to schools and public.

I own and occupy **and the set of the set of**

My home is named (non-associated) in relation to the project.



I strongly object to the SDD-10315 Bowmans Creek Wind Farm for the following reasons:

Loss of Visual amenity – Landscape and Visual

 In relation to The Independent Expert View document – OHD Landscape Architects 16-11-2023, 1042-Z0-01 Revision C states:

- Section 2.4 Evaluation of Visual Performance Objectives as "non-compliant. (Multiple Wind Turbine) Level 1 Residence S17-2

-Section 3.1.2.1. Bowmans creek cluster Table "Notes S17-2 is 2.04km from Turbine 8 has a Level 1 Sensitivity concluding turbines in two 60-degree sectors is non-compliant for a level 1 high sensitivity receiver against the VAB Performance objectives".

Comments by OHD in Heritage report indicate and I agree that:

- "Given the proximity of this residence to the VIZ1 & VIZ2 threshold, the cumulative wind turbine effects, the aspect, front door location related to turbine locations, and elevation of the residence, if the screening cannot be successfully agreed, maintained, or provided then the closest wind turbines to the southeast should be considered for removal due to Magnitude impacts on the [level 1] residence.

The potential loss of screening of WTG 8, 7 and 6 to S17-2 could be exaggerated by micrositing. (EIS notes micrositing of up to 100m may be required across the project) of the turbines. OHD recommends that the solution be prepared in detail and resolved after consideration of any proposed micrositing of WTG 8, 7 and 6.

And in summary states

3.1.2.2 Summary:

If agreed by property owners, provide all mitigation measures proposed in the LVIA.

1. If requested by the S17-2 owner; provide vegetative screening to project site allotment immediately south of road reserve adjacent and south of S17-2 to protect the amenity of the level 1 residence S17-2. If screening cannot be provided WTG 6, 7 and 8 should be removed due to Magnitude impacts on the level 1 residence.

Reasons why screening will not work to the South of road reserve/the road reserve or my land surrounded home are as follows:

<u>TREES TO SOUTH BOWMANS CREEK ROAD</u> – "potential project-controlled allotment"

- I have no control over these trees or their protection, as they are not part of my property. The to the south will be trimmed/removed or at least severely affected for road construction and widening as well as temporary road construction so WT's can be safely transported.

- The trees and saplings in the property to my south, are a combination of *Angophora floribunda* - Apple gum and *Eucalytpus moluccana* – Grey box, these are spindly type trees with minimal leaf cover, particularly on degraded and compacted ground and drought times. Due to poor soils, the species are very slow growing. They will not obscure views to WT 8.

- Southern land is agricultural land used for cattle production for last 160 years. Due to very few trees in this paddock the cattle tend to utilise the shade of the *Angophora* tree causing - severe rill erosion and heavily compacted ground. The soils are of poor quality, (*Angophora sp.* tend to grow in poorer soils) sandstone clay.

- I acknowledge there are some trees to the south looking directly from my front door towards WT 8 WT6 and WT 7. These few trees do not screen my view to the

WT8 and only partially screen WT6 and WT7 from my front door. After road upgrades I believe I will clearly see WT 8 WT6 and WT 7 towering from the ridgeline at approximately 540m high in the skyline to tip of blade. **Fig 1**

- Ark energy and DPE believe that trees will not be removed or disturbed even when they will have no control over that scenario.

- Other areas of my property all 3 WTs 6,7 and 8 will be visible possibly WT 20 and 18 as well as another 13 WTs to my west.

The few trees around and in road reserve will not screen the WTs; it will take 20+ years based on their slow growth rate and structure to form a decent crown.
Angophora trees are commonly know as 'widow makers' due to the trees ability to drop large limbs to regenerated itself, constantly changing the view to the south.
Angophora floribunda is extremely susceptible to wind storms, I have seen this type of tree loose most of its branches in many storms in the last 20 years.
The trees have grown extremely slowly over the last 20 years due to drought, compacted soil, rill erosion, cattle grazing amongst trees, cattle eating tree leaves and cattle rubbing on trunk of tree, soil erosion, poor soils and disturbance. Further to that the tree in the gully partially screening WT7, is an Angophora; is approximately 100 years old and towards end of its life.

- I believe tree planting for screening does not fit in to the RFS 100m recommended setback from my home.

- Farmer's from time to time clear/fall/poison trees on their land to increase grass production.

Attached below is a survey of Lot 1 DP 1167323 with easement as to user - 2010







Fig. 1 Turbine 8 – Section of Photo montage provide by Epuron 2019 showing the magnitude and gateway to 484 Bowmans Creek Road.

Road Upgrades 31 and 30 outlined in the EIS **Fig 2 and Fig 3 and fig 4 below** clearly shows the degree of work and construction.

Proximity to Wind Turbines; my home will be 2.038km from WT 8 and further to this Turbine WT 6, 7 and 20 are <3.0 km. These WTs will dominate my southern view, as the turbines are 220m high at a distance of 2-3km.

As noted in fig 3 item 30 states a temporary road will be constructed across of gully. The bank to the creek is approx. 7m in height. This is going to take a considerable amount of fill and tree damage and removal.

The Wind turbines will tower over the tree crown regardless of a few trees being preserved.

The DPE assessment report cannot realistically say that trees will not be removed or damaged. They will have no authority over the road reserve or its care and control of the reserve.

As noted in fig 2 item 31 "Overhang and road path clearance required". I was told with a discussion (23/2/23) with Ark Energy the road will be raised 1-1.5m front its current level. When the road is raised to this new level more trees will need to be trimmed and removed to allow the load path overhang on the southern boundary immediately south of road.

As stated in Fig 2 item 32 pavement widening will require "road widening with suitable sub base as per OSOM Standard required (e.g.Gravel), and a tempory road constructed".

I worked in Council - Survey and Civil department, I am trained in road design as a survey/civil draftsperson. It is this experience in combination with understanding of my natural environments; the limits and capabilities that the native trees in the road reserve and surrounds (north and south of road reserve) will be not saved or preserved.

I am not unable to understand how the DPE and Ark Energy can say no trees will harmed in road alterations when their documents clearly states 'load path clearance required' and 'trees require trimming for road path'.

30	Albano	Overhang	Trees require trimming for load path		Y
30	Albano	Pavement Widening	Wheel path exits pavement. Suitable sub base as per OSOM Standard required (e.g gravel), temporary road.	Y	
31	Albano	Overhang	Load path clearance required		
31	Albano	Pavement Widening	Wheel path exits pavement. Suitable sub base as per OSOM Standard required (e.g gravel), temporary road.	Y	
32	Albano	Pavement Widening	Wheel path exits pavement. Suitable sub base as per OSOM Standard required (e.g gravel), temporary road.	Y	
33	Albano	Overhang	Trees require trimming for load path		Ŷ
33	Albano	Pavement Widening	Wheel path exits pavement. Suitable sub base as per OSOM Standard required (e.g gravel), temporary road.	Y	

80020015 | 27 May 2020 | Commercial in Confidence



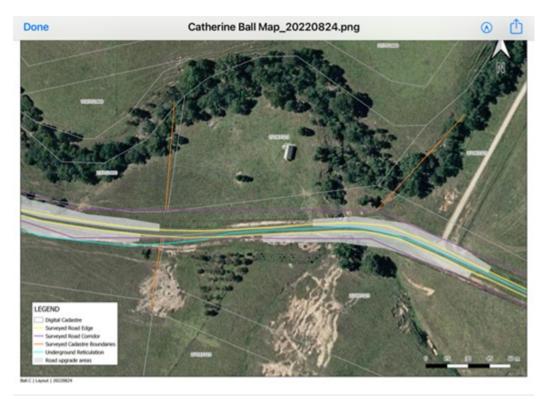


FIG 4

The above diagram was provided to me by Ark Energy in an email (below) on 16th June 2022 and stated: -

As we discussed I have attached a current site map of the wind farm and also the specific pages of the cardno report that reference your property and the imagery associated with it. Figure points 30, 31 and 32 are relevant for your property. I am aware that image in the report was taken at a time when it dry and the trees along your boundary have grown significantly since then, in saying that load width does appear to have to interact with your fence boundary. There does appear to be some road widening required though it is opposite your property. It is noted and clear in the images that upon crossing the gully there will need to be some trimming of trees that are in the road reserve or hang over into the road reserve.

If there is any further information, I can provide you or anything I missed please do not hesitate to contact me.

Kind Regards, Rebecca

REBECCA RIGGS

Project Manager

OHD report states below:

Generally, vegetative screening mitigation proposals should only be associated with private property as the screening can be linked to the anticipated impacts on a level 1 or 2 receivers' property. Screening within private property allows the screening outcome to be controlled between the proponent and the property owner. Reliance on existing or new vegetative screening within road reserves should be avoided as the authorities who manage or work within these road reserves may have development plans or maintenance requirements for the road reserve that may reduce the effectiveness of the proposed mitigation, leaving viewers exposed to unintended visual impacts.

Reasons why screening will not work in road reserve are as follows:

TREES WITHIN ROAD RERSERVE

- OHD 2023 – "As neither the residence owner nor the Proponent control the road reserve or associated vegetation" trees within the reserve cannot be protected or saved.

- The extensive roadwork required in this area will impact current native vegetation. I have been informed by Ark energy the road level at my gateway entrance will be approximately 1-1.5m or higher than currently. Fig 4

Ark energy and DPE believe that trees will not be removed or disturbed in the road reserve even when they will have no control over that scenario.

-The sealed section of the current road is 4m wide. Currently cars have to take one wheel off tar section of road to pass safely. The road will have to extensively widen for large trucks, OSOM and Turbines movement. The survey road width is 20.115m wide, (page 3) the track required by Ark Energy in this project is 50m-100m wide depending on various reasons.

-The local council are the authority to 'care and control the road reserve' and in doing so need to clear vegetation from time to time for road safety. Also regular weed spraying occurs and overspray can occur and kill nearby natives.

-The road reserve and privately owned land to the south are well within 100m distance required for tree planting around homes by RFS.

-Currently Bowmans creek enjoys approx 10 vehicles using this road daily, increasing to 270 per day on construction.

Ark Energy employed a consultant surveyor to survey the road reserve around August 2022. He spent a few weeks walking up and down the road reserve between my property and neighbours. I did approach him to ask what he was doing and whom he worked for, he was not willing to answer either of my questions. He did say "all the trees can be removed within the 20.115 width". I guessed he was working for Ark Energy and later this was confirmed. My point is that Ark has undertaken a survey of the roadway last year and should have a good understanding of their road upgrade proposal. Why not speak to me about the results?

TREES IN MY PROPERTY

--My home is approx 37.764m to road reserve leaving limited planting space to for a screen and it would take many years to reach the required screening height.

- This area needed for screening will obstruct my current driveway entrance.
- The planting would be 10-40m from my home, well within 100m distances recommended from homes by RFS making planting impossible.
- Energy Australia does regular tree lopping to maintain safe distance to power lines in this area of the road, bridge and gully. I have had lengthy discussion with workman and managers regarding not to trim trees in gully, as they are never going grow any closer to the power lines. The trees have already reached their maximum height.
- I have an easement over my property (Survey plan page 3) for:

"Easement for electricity and other purposes 15 wide and a right of access 4m wide." This easement is in area proposed for screening.

-Trees are extremely slow growing, without vigour, sparsely leaved, stunted and small in size due to strong winds, soil type, past degradation, topography and more regular droughts and extreme storms.

In conclusion preservation of trees in road reserve is impossible. Tree planting to the south (neighbours property) and in my property will not be successful and will not fit in with the RFS guidelines. Tree planting or screening on my land would be too close to my home (wooden and highly flammable) and doesn't meet RFS guidelines for distances from home.

Based on the above facts the WT6, WT7 and 8 should be removed due to Magnitude impacts on the level 1 residence.

I have had several meeting with Ark energy regarding the road reserve and each time I get a different answer regarding the vegetation.

Initially I raised the issue in a CCC meeting 16-12-2020 Question 27 (I never received an updated photomontage or got an answer regarding trees in road reserve).

1. "Trimmed and some tree removal for trucks" – 16^{th} June 2022

2. "Most of the trees would need to be removed or cut to allow for turbine delivery. The road will be 1-1.5 m higher than the current height and to do this considerable amount of fill would be required and most likely cover the trees to enable a decent batter". I was told I needed to "move my driveway approx. 80-100m to the west because of the road upgrade" -23^{rd} Feb 23

3. As recently as 4th December 2023 on a phone call with Rebecca Riggs that "no trees would be harmed in road upgrade". I presume this meant any trees in road reserve, my property or the property to the south.

On 28th April 2022 Iwan Davies, Nicole Brewer, Clay – DPI and Visual consultants visited my property to inspect my views of the turbines to the south WT 6, 7, and 8 and 13 WTs in my west view of the horizon. I raised problems regarding Visual and noise pollution, tree removal in road reserve and dust and traffic; Indigenous artefacts found around my driveway and spoke to them about the stress of this project for over 4 years.

I felt like DPI listened to my issues and would resolve some of the problems; particularly the turbines to the south and road upgrade noise. The only changes made to the EIS was WT 8 moved 100m back to fit into the 2km distance required for a Level 1 sensitivity – Local land Heritage. I don't know how many people; DPI representatives, at least 5 people from Ark energy at various times, several hosts, surveyors and consultants have stood at my driveway and talked about and photographed the couple of trees that sparsely block my view to the south.

It is like everyone puts on their rose coloured glasses to fit me into their guidelines (by 38m) 2038m - WT 8 and then happily imagine how the trees could grow to block my view. This is not going to happen as much as everyone wants to talk about it and pretend it will happen. Ark Energy and DPE have ignored the truth and their own specialist consultants OHD. DPE saying my view is "partially blocked" to the turbines is vague. What is partial? Why not give a percentage of cover? Why not discuss the reality of the site?

Following site visit from Rebecca Riggs 14/6/22 I sent Iwan Davies an email 1/08/22 updating him on my request to Rebecca Riggs for map of road alterations, tree removal and turbine overhang area. Also explaining to him the Neighbour

Agreements Ark energy was offering is nothing compared to the ongoing impacts and I will not sign.

To clear up some issues I have taken a photo from standing inside my home at entrance doorway looking towards the south. Fig 5

I have never seen the photomontage in the DPE assessment report with some micro siting on WT 8, only in their final assessment.

I have asked Ark energy for an updated photomontage several times over the years and also for the turbines to be shown in front of trees so I could be aware of the visual impacts in the worst-case scenario of road upgrades and extensive clearing of vegetation. This was declined, Ark energy as responded by the following:

We do not do layouts for photomontages with wind turbines displayed in front of trees or vegetation, unless there is a high amount of certainty that these trees will be removed. We don't feel that would be an accurate reflection of what the project will look like in this case and will only cause confusion, when different versions of photomontage are shown within the EIS and otherwise to community members, as to which ones are realistic. We believe that the photomontages that have been provided are realistic and do accurately reflect the view of the project from the location of your property.

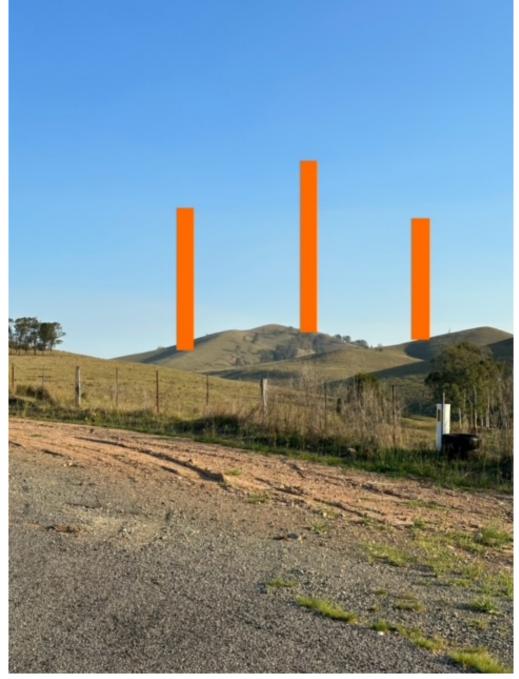


Fig 5 – Photo CBall - December 2023

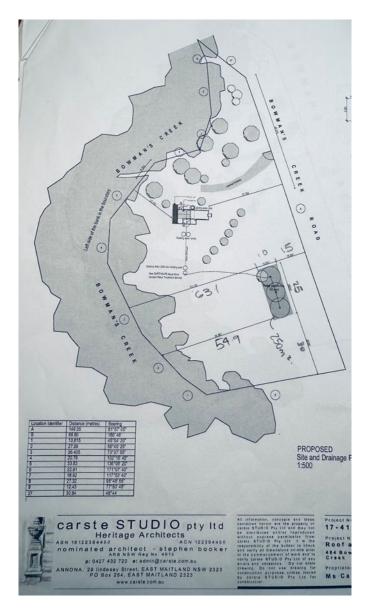
The view to the south turbines WT 8, 6 and 7, at least I will know what my view from front door is going to look like when the turbines are built. This landscape is very changeable in the case of dropped branches, storms, droughts or simply die back.



Turbine 8 - Part of Photomontage from Ark 2019 – South view



Above Photo was taken from 50m east of my driveway looking south towards WTs 7,8,6 – I have inserted WT size to the best of my ability. From Left WT 7, centre WT 8 Right WT6. For my own assessment, understanding of the scale of these WT in relation to my natural environment is important. This is the sort of reality that Ark energy does not want the community to understand or see before it is built. "It will only cause confusion to the community" - Ark energy. I think the community's confusion will come when they actually do see that scale, the enormity within the natural landscape and the fact these turbines are towering over us sounding like cement mixers in the sky. Once they are approved this is the magnitude of the project we are going to deal with. If this reproduction is wrong could Ark energy stop being so deceptive and actually represent to the community the actual size that the community will see. The community can only imagine what the night lighting is going to do, light up the countryside for kilometres in a red hue. Ark energy will probably tell the community your lucky they aren't flashing? Or are they?



Site plan – heritage assessment 2017 – showing distance to road as 37.764m

View from my front door to the west – I will clearly see may turbines from my front door - a photo montage was never taken from this site – I will definitely see many turbines through thin tree cover.



Fig 6 - Views to 13 Wind Turbines in west – Part photomontage – Epuron 2019 – closest turbine 5045m away – taken 10m from front door



Photomontages

Section 2.6 Photomontage "are non-compliant with the requirements of the VAB, should not be used for assessing the scale and magnitude of the impacts as the impacts of the turbines is visually diminished".

The Department have knowingly recommended Consent conditions based on the misinformation provided by Ark energy.

Summary of Loss of visual amenity - various issues

• The landscape character is unique – less common – rare.

- I will be surrounded by at least 16 Wind Turbines from my property and a total of 4 turbines within 3 Km from my property. WTs will be visible 2 x 60 degrees segments and surround my front door view.
- 13 Wind Turbines (west) are between around 5km away from my home and are all visible from my property. (Photomontage Epuron December 2019).
- WT 72 and 18 are about 3.1km. South I think they may be visible on the horizon can't seem to get any confirmation from Ark energy.
- A further 5 Wind turbines WT 19 and 22, 23, 24 and 25 are just over 3.3km. Not visible but easily audible at my home.
- Bowmans Creek is one of the last untouched rural valleys in the Hunter and is pristine cattle country, probably some of the best grass fed beef in Australia and beyond.
- Loss of visual amenity due to the construction of 23 wind turbines surrounding my property. <u>Reference:</u> Bowmans Creek Wind Farm EIS, Appendix H. See attached Fig 1 and 6
- The view of 220m turbines towering over my home will be unbearable and a great disruption to my visual landscape that is situated along the creek line of the Bowmans Creek valley and with ridgelines views. <u>Reference:</u> Bowmans Creek Wind Farm EIS, Appendix H pg.187.
- Blade flicker will unacceptable to normal visual amenity. Flicker will occur with sun and moon rising and setting causing an unnatural appearance and flicker. The surrounding landscape at times will have a serious strobe effect in certain areas causing driving difficulties and distraction and possible health effects. Turbine 8 to be removed.
- Blade Glint will also cause disruption to the visual landscape.
- As my home is Local Government listed as Heritage LEP No.156
- My noise levels will be up to and over 75db for up to 80 hours a week on construction of road. This level of disturbance is unbearable to live a normal life, study or sleep. In DPE assessment "the increased noise levels at \$17-2 residence would be short term and intermittent for the period of the road upgrades and once that had been passed it would return to lower levels." Do you think that 80 hours a week of noise at 75dbs, that is equivalent to standing at kerbside on a busy highway is acceptable? How long is the upgrade going to last? Again vague answers to the consequences negatively impact my life! After upgrade the return to 270 vehicles per day on construction! Is that lower levels?? For a hundred years Bowmans Creek has no more that 5-10 vehicle per day, and that's busy!
- I request an alternative road/access route for Eastern turbines group (WTs 18-25 WT72 and WTs 6,7,8) should be investigated by Ark and DPE. Bowmans Creek road should be avoided and the DPI needs look at an alternative routes through hosts land or similar. It makes no sense to cause so many disturbances for a few turbines when there are alternatives.
- I request to have all Turbines closer than 3.1km to my home removed from the project -WT7, WT8 WT 6. Green Beam mention that "I have some degree of screening" pg.188 but these trees are not on my property so I have no control over them and will most likely be removed for underground power line and road widening construction. Further to that road alterations are proposed in the EIS along this area; trees will be removed for

access of over sized vehicles and blades transport. So I conclude it will be unlikely for any level of screening to exist in the east or south view of my home after construction and I will look out my front door to see at least 3 Turbines.

- Further to having all turbines removed from a 3.1km radius to my home I would prefer to have no wind turbines in any of the 60 degrees segments. I would like Turbines No.26-31 set back outside my view and sound range, at least 6km setback would mitigate the some of the problems associated with this construction.
- Night-lights installed on the Wind Turbines will have a negative affect on this night landscape. There is no night-light in this area and the night landscape destroyed. I request that no night-lights be installed on the wind turbines or any other construction. I request that night-light be removed from WT 8, 7 and 6.
- Ark states (pg39) that any road works will be on the opposite side of the road (this is where a trees line exists). This southern tree line is being used in the DPE to mitigate my visual issues to the south. When the road is widened, trees will be removed or disturbed to the point when they die.
- I will then clearly see WT8 as well as WT 6 and 7 from my front door.
- The mitigation of screening proposed will take at least 10-20 years to screen my view to the WT. I am also concerned it will not meet the Bushfire regulations required setback of 100m.
- The surrounding landscape will turn from beautiful countryside to an industrial development. The development does not "fit" in with the landscape.

Driveway Changes

- Ark Energy has informed me that I require moving my driveway 80-100m to the west along Bowmans Creek Road. I do not want my driveway moved and feel that its current position (120 years) works the best for my entry and exit. A new driveway will use 600 – 800m2 of my land.
- The afternoon of February 23rd, 2023 I noticed several hosts and Rebecca Riggs and Robert Tew standing at my driveway and pointing at trees and my driveway. I approached and Rebecca, she informed me that I would not be able to use this driveway after approval of BCWF. Ark also told me on that day "that my trees along the road reserve and into my property would be removed." I recall being horrified as it has taken me 12 years to grow a few trees, a red cedar and native shrubs at the road entrance.
- At a later meeting in May 2023 I was told I would have to get quotes to have a new driveway constructed 80m to the west. I asked for more information and was told just get a quote and put the entrance driveway somewhere that has a "good line of site for exiting".

Ark energy 13th June 2023 email correspondence below:

"In relation to the driveway alignment, I will reach out to Sally as I have met her in relation to different parts of the project. Additionally, I will have a discussion with our engineers that have completed the civil designs for the project, some of the team in that office have experience in this space. Once I have spoken with them and highlighted the issue and what we want to achieve, perhaps we can further this and meet at your property for them help you with making an informed decision on the matter, ensuring all the necessary steps are following to ensure we are meeting all heritage requirements." In reference to "Sally" Flannery consulted for me regarding the church Local Land heritage, I thought it would be a good idea to get her ideas on the changes to the driveway as it is a heritage listed property and you cant just move driveways and viewpoints from the road on such an item. I have not had any further discussions with Ark energy regarding reaching out to Sally or met with engineers to make an informed decision. Instead Ark asked me to provide quotes and drawings of the proposed driveway and screening, which I did- 5/10/23 driveway quote and 21/11/23 planting quote. I did reach out to civil engineers and a tree consultant because I was under the impression (after meeting 30th May 2023) this project was a "done deal" and the DPE was going to approve project "with some small amount of micro-siting and screening". I started to loose trust and confidence in Ark energy around this time; Ark energy has never followed up information I have requested except how I fit into their guidelines with a link.

- Since Ark Energy have taken over the project consultation has been limited to a couple meeting regarding signing a Neighbour agreement.
- 1. 14th June 2022 was an introduction with project officer of Ark energy, Rebecca Riggs and another Ark employee, from Tasmania – In this meeting I informed Ark energy I was not interested in signing Neighbour Agreement- NA, the mitigation did not meet the impacts. I followed up with email to Rebecca Riggs again asking for some more information regarding tree removal and trimming.
- 2. 23rd Feb 2023 Rebecca Riggs, Robert Tew and 4 hosts standing at my driveway discussing the removal of my current driveway access and tree trimming?? Hosts and Ark informing me as to where my driveway should go!
- 3. 30th May 2023 a meeting with Rebecca Riggs and Robert Tew to discuss a neighbour agreement and noise issues from road upgrade and mitigation. Nothing was achieved in this meeting except more pressure to sign a Neighbour agreement. I do recall being told, "my biggest problem would be the road construction noise and that wouldn't last long." In these meeting very little detail of the effects the WTs will have on my property was discussed except being told I fit into the governments guidelines. I have refused to sign a neighbour or host agreement. I was told to get a quote for screening; upon doing this I was told the quote didn't have enough detail. My frustration of this project is undeniable. I feel like I am not being informed or assisted by Ark Energy in any of these processes. I invited Ark energy to come to my site for a vegetation-screening meeting with a consultant and I was ignored. I asked for help with the design/placement of a new driveway (which I don't want to get) and I was told it was up to me to decide and design.
- Whilst trying to negotiate a quote for screening I was told I must provide a species list as "we are going into battle with Ark energy". This has made me feel very disempowered with the project. A negotiation regarding any mitigation has been difficult, I wrote to Ark energy 4/12/23 and said, "mitigation measures are not to my satisfaction for such a large project. I feel the avoidance and mitigation measures Ark energy have proposed are not sufficient to my level of disturbance, noise, visual, vehicle movement, dust, privacy and changes to my driveway." Ark energy responded that evening and phoned me at 5pm 4/12/23 to discuss my issues of mitigation and tree removal in road reserve at my driveway. Rebecca Riggs said, "no trees would be removed during road construction and during WT delivery and I may not longer have to move my driveway".
- I find this extremely frustrating that I have been asking the same question for nearly 4 years (tree removal and vegetation clearing in road reserve) yet another variation over the phone late on a Monday evening. This knee jerk reaction makes me more suspicious of their truth. Again I am not sure how this promise can be made when Ark Energy have no authority over the road reserve. I am getting the feeling I am being told what I want to hear, whether or not it is true. The truth of this matter has been moulded into vague answers that have no meaning. I have never read so much vague subjective analysis in DPE assessment report that has no real meaning. The specialist report OHD has stated my situation clearly and simply. OHD states Removal of turbines 6, 7 and 8 if screening cannot be agreed to in a detailed plan and it CAN'T. I request the removal of these turbines.

 In February of this year I was grateful to have inherited 1/3 (33.3%) of 177/752465, 166/752465, 149/752465 from my uncle's estate. This land has been marked as having a share of turbine 37. I have not received a host agreement to review or signed a host agreement. I do not understand the decommissioning process or had it explained to me.



The Response to request information 28th October 2023 is shown above is incorrect – the Dwelling ID is wrong, my ID is S17-2. The photomontage is misinformation.

This is a 'response to request further information' and this was not picked up by the department or Ark energy, is anyone even looking at requests for information or just signing off?

Increase Noise and Vibration

- Noise predictions indicate that levels will exceed current levels by a large amount. Epuron's studies indicate I have a current background noise of 24 decibels; this will increase to over 35 decibels, generated from the turbine blades and other sound. <u>Reference:</u> *EIS*. This increase of noise will be unpleasant to live comfortably. The turbines will also generate very low frequencies that have been attributed to sleep disturbance. The World Health Organisation acknowledges that sleep disturbance contributes to chronic disease and child development issues.
- The noise and vibration from traffic during construction will be unbearable 75+dbs. My home is 37.7 metres from the road corridor. Traffic and construction is 12 hours per day 5 ½ days a week. 7am 6pm. Ark energy have continued to write in documents and argue with me that my front door is 45m from road reserve. When we are talking about 75dbs it is going to make a huge difference to the noise that is already rates as "standing on kerbside in heavy traffic". Brochure from Epuron 2020.
- Noise from turbines will affect people on the valley floor at a higher level than calculated. Most often the wind blows greater and constantly on the ridgelines and is calm in the valley floor (my home). This will increase sound levels at our homes greater than what I have been told.
- Noise, vibration and dust from road widening, road alterations, temporary road construction, bridge upgrade and this is all immediately opposite my home
- Figure 39 states that 35 road separate road upgrades will occur over just 12 km distance from my home. 10 upgrades will occur within 2km of my driveway (does ark energy believe I will only hear and have dust and vibration from the couple of road upgrades out front home! No I will hear every upgrade for at least a 5- 7km distance) how many and how long? Around 20 upgrades over a 3-year period! 3 of the road upgrades will occur at my driveway entrance, within 37.7m from my front door. This will cause noise, vibration, dust, water pollution, dangerous driving condition and increased traffic.
- Ark Energy has told me I am required to move my driveway west approx 80-100m Feb 2023. Then I was instructed at meeting in May 2023 with Ark Energy to get quotes and meet with engineers to discuss the driveway and you work out the design. Ark energy not even interested enough walk along road with me to discuss position of driveway!
- I was also instructed to get quotes for screening, meeting May 2023. When I did get a quote Ark Energy reduced planting by 60%. I did explain in that meeting that it is very difficult to get consultants to quote so far out of town as well as I didn't have a lot of time to do such things. I requested that a Heritage consultant get involved at this point but Ark Energy ignored my request.
- I also requested a Heritage expert be consulted regarding changes to my property in 2019 in a meeting with Brett Peterkin (Consultant) and Virgil from Epuron.
- I request further studies to understand the full impacts of these road upgrades. I disagree strongly that I will not be impacted by these large scale road works and the Level 1 noise it will generate 75db+.

Increased Traffic

- Increase of traffic on Bowmans Creek Road during construction and management.
- Risk to local residents using roads while construction is occurring.

- The Project is expected to generate 282 total trips in and out of the site for a period of 18 months. This will continue for 2 or 3 years during construction although the numbers will slightly decrease. Currently no more than 10 vehicle trips are recorded per day. This is close to a 30 times increasing in traffic.
- The local roads will not withstand this type of vehicle movement and increase traffic movement. Ratepayers will foot the bill.
- Road upgrades within 37.7m of my property. Further to that 35 road upgrades to Bowmans Creek Road and Albano Road. I use this road frequently and assume there will be long delays with such large-scale road works when travelling to Aberdeen and Singleton.
- The current conditions of the roads it will not be safe to generate this level of vehicle movement, even with upgrades. It is well known people take no notice of the automatic traffic lights to control traffic in isolated areas. As accident will be waiting to happen.
- The roads in this area have not been constructed for that type of usage/weight and ratepayers will be left to repair problems left behind. Roads will melt and move on very hot days with OSOM traffic.
- Noise and vibration caused by traffic to my home that is 37.7m from the road corridor.
- Safety issues when leaving and entering my driveway.
- Increased dust and erosion of sealed and unsealed roads.
- In conclusion Bowmans Creek road and Albano Road are not suitable for site access to build the Wind Turbines. I request that an alternative access route be considered for the project.
- My property will be heavily impacted by way of visual, traffic, noise, dust, vibration and loss of heritage significance. Further studies and more precise information needs to be collected so a thorough analysis can be concluded.

Bushfire Risk

- Screening required for mitigation to block the visual and noise issues will add to bushfire risk of my property. Proposed native vegetation mitigation screening is between 20-40m away from heritage-listed property.
- Bushfire risk through ignition of turbines.
- Bushfire risk through loss of water bombing procedures from planes/helicopters due to height and placement of Turbines

Community Consultation

- Community consultation to this point has been inadequate. I was not informed of the project or processes until February 2019, 4 months after community meetings. No letter drop when Epuron was visiting the local area on many occasions.
- Individual consultation inadequate through not providing written information, intimidation and pressure from Epuron and Ark energy. Basic lack of information. My

first meeting with nearly 5 years ago Epuron staff said to me "I was lucky my land was not being acquired".

- I have found the whole process extremely stressful due to the lack of transparency about the project. I feel a lot of pressure was applied to sign an agreement before the EIS was released. I had no idea the opportunity to remove Turbine 9 and 10 may be possible if a neighbour agreement was not agreed to, Epuron informed me in March 2021. If I had known this information earlier I would have found the process less stressful, unnecessary behaviour to the community.
- Most people in Goorangoola and Singleton area are not aware of the real impacts of the project.
- The Community has been split into two parts, those that agree and those that don't agree with the project. Suspicion and misinformation has become part of this community due to the project and its impacts on surrounding landowners. The EIS was difficult to interpret. Maps were displayed at a huge scale on an A4 page most maps were at such a large scale it was difficult to see any detail, measure distances and understand the size of this ecological disastrous footprint. I still don't know if there is going to be a construction compound on top of hill east of my residence on Bowman's creek road entrance to WT8. 1.8km from my house, Bowmans creek road, opposite Turbine 8. I have seen construction compound on older maps and then on new maps but not maps last year. Is the construction compound going to be built?
- The many meetings with Epuron and Ark energy have not been helpful to my understanding of the negative effects I will be impacted by this project. It was, more of a process in telling me what would happen, I felt like nothing was up for negotiation. The meeting were not a two-way conversation that would leave me more confused and very stressed than before the meetings.
- Once people area treated inappropriately, they are offside and there is a lot more work to do to gain trust.

Historic Heritage

- My home S17-2 is a Local Land Heritage of Singleton Council LEP No.156. The history of this Church and former school is over 120 years long. The Roman Catholic Church of Our Lady of Perpetual Help (Succour) was opened (and possibly consecrated) in 1902 by Bishop James Murray. From 1902 to 1973 church services and community missions took place regularly. Mass was said once a month at Bowmans Creek. Locals could rotate between the country churches each week if they were sufficiently dedicated. Other nearby churches was at Glennies Creek and Ravensworth. A newspaper cutting from 1925² gives the Mass times for the parochial District of Singleton indicates that of the 7800 population there were 1800 Catholics. It notes that as part of the Parish, Our Lady of Perpetual Succour, Goorangoola, opened in 1902, had Mass celebrated on every second month and Christian Doctrine classes were held every Sunday. <u>Ref</u>. Statement of Heritage Impact, 2017 Sally Flannery, Orbit Planning, Heritage Consultant. I will attach the full document (24pages) that fully describes the heritage of my home (as requested from Singleton Council 2017).
- Singleton Council issued an Occupation Certificate for this heritage listed home in July 2019.
- The building was formally listed as Heritage in May 2017 based on the criteria listed below. With the support of Council and NSW Department of Planning & Environment the former Roman Catholic Church has recently been listed as a heritage item under

Schedule 5 of Singleton Local Environmental Plan (SLEP) 2013. The SLEP amendment was accompanied by a detailed heritage assessment prepared by Carste Studio Pty Ltd. The Assessment of Heritage Significance included a 'Statement of Significance' that assessed the building against the NSW Heritage Office criteria, and stated:

"The church was erected in 1902 by Mr. William Schmierer, Great Grandfather of the present owner for the local Roman Catholic residents, on land owned by the Ball family. The site and former church building are historically significant as a privately owned and constructed Roman Catholic Church. (Criteria a).

The church and site have strong historical association with the early settlers of the area and in particular the four generations of the Ball family who not only provided the land, but also worshipped in and maintained the building. Other families who were strongly associated with the site and building were the Bowmans Creek Marshall family, and the Catholic families on Campbells Creek – the Sattler, Cooper and Ritter families, and the Kinzigs of Dry Creek. The Church has a strong service association with the St Patrick's Parish of Singleton and St Catherine's College, whose youth Group used the building for retreat camps from 1979 to 1984. The Redemptorist priests from the broader Roman Catholic Church used the church for Retreats and Mission. (Criteria b.)

The building is a Simple Carpenter Gothic rural church building, with gable roofed Nave and Vestry annexe. In its setting, located on a flat beside the creek and low down in a valley, with a background of trees along the creek route, the building has landmark qualities. While it is not now used as a church, it still retains the identifiable characteristics of the bush church. (Criteria c.)

The place has several layers of importance for its social value as a meeting place for the dispersed rural community, its use as a School for a short period of time and ongoing weekly religious instruction as well as a place for religious retreats by the Redemptory priests, a venue for St Catherine's College Youth Group camps, and its importance as a worship centre for the Roman Catholic community of the Bowmans Creek area. (Criteria c.)

The bush carpentry methods are of interest, the workmanship employed in construction being of high quality. (Criteria d.)

In dispersed rural communities, the social focus was on Halls and churches, and in this area, there are very few remnants remaining, many buildings having fallen into disrepair through closure or lack of use through rural decline, and suffering from storm, flood and termite damage. Thus, this place is a rare remnant in the remote area of Singleton LGA. (Criteria e.)

The building is intact and retains much of its detailing and elements, including some of the movable elements associated with its church function. Some of these are not retained on site, but are stored locally. The interior timber walls, ceiling and floor and their finishes are in very good condition. The exterior requires some repairs, which are in the most part trim and painting. (Criteria f.)"

- The building met the criteria for heritage listing on a number of the criteria including criteria a, b, c, d e & f and was added to Schedule 5 of SLEP 2013 listed on 12 May 2017.
 - For further information: Statement of Environmental Effect Lot 1 DP1167323 – Orbit Planning, November 2017 and Statement of Heritage Impact – Caste STUDIO Pty Ltd, October 2017
- The above document validates the importance for Historic Heritage of my property and the surrounding area and how any disturbance will to the area affect this listing.

- I note that in the EIS has represented my home with misinformation. The photo on pg 23 Ark Energy is misinformation, as it was not listed as heritage at the time of the photograph (Google 2010).
- My home is 37.7metres from the road corridor and will be heavily impacted by traffic, vibration and noise. It is a simple weatherboard construction without insulation.
- Ark Energy states (pg39) that any road works will be on the opposite side of the road (this is where a trees line exists). This tree line is being used in the EIS to mitigate my visual issues to the south but if the road is going to be widened then the trees will need to be removed. This contradiction in the EIS and DPE assessment needs to be addressed.
- Ark Energy states road works will be 45m from my front door of my home. It actually states 37.764 see site diagram.
- Ark energy assumes "the development will not affect views from the heritage item", I disagree.
- Ark Energy incorrectly assumes that "road-widening works will not affect the heritage item", I disagree.
- Ark Energy incorrectly assumes "the development will not dominate the heritage item," I disagree. See attached documents to support this.
 - Statement of Environmental Effect Lot 1 DP1167323 Orbit Planning, November 2017 and
 - Statement of Heritage Impact Caste STUDIO Pty Ltd, October 2017
- I request a detailed study to be done on my property regarding the heritage impacts and other issues that will impact my home. It is not sufficient to look at it from the road corridor, display an incorrect photo when it was not listed as heritage and ask associated stakeholders about the history. I really am surprised the lack of information and misinformation regarding this unique property within very close proximity to Turbines and road alterations.
- Loss of local heritage in the Bowmans Creek area; it is a unique historical place of European heritage from 1870's. The area is dotted with wool sheds, dance hall, Blacksmiths, Local land Heritage Church (my home) as well as federation homesteads; the architecture provides many examples of a long history and settlement for over 150 years.

Aboriginal Cultural Heritage

- Loss of aboriginal heritage; song lines, aboriginal walking tracks (St Clair Reserve to Mt Arthur), disturbance of massacre sites and archaeological remnants. Destruction of unique sandstone cultural viewing platforms. Disturbance of song lines corridors along ridge tops.
- Significant PAD, archaeological deposit was found near my driveway entrance and other tools in close proximity. Further artefacts found nearby where road construction is to occur.
- Areas around Bowmans Creek and Lincolns have high aboriginal significance. Proposed Underground cables are to be constructed in that area. My father found grinding stones and other unusual stones in the Lincolns creek in the 1980's. The area is surrounded by

300-year-old Grass trees – *Xanthorrhoea sp.* which holds great significance to Aboriginal culture. These trees will be heavily impacted with construction of access tracks.

- I request that further studies be done regarding Aboriginal Cultural Heritage. Several very important artefacts have been found along Bowmans Creek Road (Albano Road in EIS). Albano Road OS-01 (37-3-1587) recorded a selection of artefacts. This is an area where the EIS has noted road alterations and disturbance. There are also other important sites under Stony Creek Bridge 3 coloured ochre (used in ceremonial events). This is also an area for alteration of roadway to allow OSOM.
- Insufficient ground surface survey. As exposure is only 15% for 925Ha and ground visibility was 70% where the survey is only 10% of total area. More studies need to be conducted to get a better overall understanding.

Water

- Disturbance and destruction of waterways; streams, gullies and creeks to Bowmans Creek and tributaries, Stony Creek, Lincolns Creek, Glennies Creek and Hunter River catchments.
- Massive disturbance of Bowmans Creek and Stony gully with road construction.
- The amount of water needed to make concrete pads is enormous and will be transported into the site adding to the traffic volume. Water trucks are very loud, cause vibration and dust.

Biodiversity

- Flora and Fauna destruction; endangered species including Koala, Powerful Owl, Masked Owl, Spotted tailed Quoll, Eastern Bent winged-bat, Feathered tailed Glider, Speckled Warbler, Glossy Black Cockatoo and Little Lorikeet. *Cumberland Ecology* collected the data sets for flora and fauna for Epuron in the worst drought in 100 years giving highly inaccurate results.
- Raptor species such as Wedged-tailed Eagle have high population and live throughout the year from Bowmans Creek to Muswellbrook will be heavily impacted from blade kills. Falcons, Kites, Owls and Glossy Black Cockatoo as well as many bats and other bird species will also be impacted adversely.
- Offsets don't fix the destruction to this fragile ecosystem. This area is so fragile any disturbance has ongoing effects.
- The Powerful Owl studies were insufficient and need to be conducted under better/different time's conditions. I sent Cumberland ecology in 2020 site maps where the Powerful Owl roosts, central to 25 turbines. They could not find any evidence of Powerful Owls even though it is regarded as common in that area near to Turbine 37.

When all the cumulative effects have been accessed this SSD project will negatively affect people in the Bowmans Creek, McCullys Gap, Muscle Creek, Rouchel and Hebden areas. The many effects will negatively impact my home by way of visual landscape, noise, traffic, vibration, pollution, night lights, loss of biodiversity, waterway disturbance, increased bushfire risk and loss of European and natural heritage.

The Department of Planning and environment have not adequately assessed the Bowmans Creek wind farm project. The department knowingly recommended Consent conditions based on

misinformation provided by Ark energy. DPE and Ark energy have picked and dodged the truth and moulded it into uniformed, meaningless answers. Business and Government are in reckless race for renewables and the community will live with their incompetence and greed for a very long time.

The proposal has been going on for 5 years. Initially it was proposed that I would see 25 WTs in 4x60 degrees, 1.7km from home. This has been reduced (because it didn't meet guidelines) but that didn't stop Ark energy proposing such a ridiculous plan in the first place. Is this community supposed to be grateful that turbines have been removed even though they didn't fit guidelines? Seems like a great strategy to break people down into signing Neighbour agreements.

I thank the Independent Planning Commission for considering my objection to the **PROPOSED STATE SIGNIFICANT DEVELOPMENT (SSD) NO. 10315 – BOWMANS CREEK WIND FARM – Construction of up to 54 wind turbines 220m height**. This development does not "fit" our tranquil rural community.

Yours Sincerely Catherine Ball

Bowmans Creek NSW 2330