



RYE PARK WIND FARM CCC MEETING

5 MARCH 2020



AGENDA

1. WHAT'S BEEN HAPPENING SINCE THE LAST CCC

2. REASONS FOR THE MODIFICATION

3. PREFERRED TRANSPORT ROUTE

4. MODIFICATION PROCESS AND STATUS

5. SPECIALIST STUDIES – EARLY FINDINGS

6. QUESTIONS

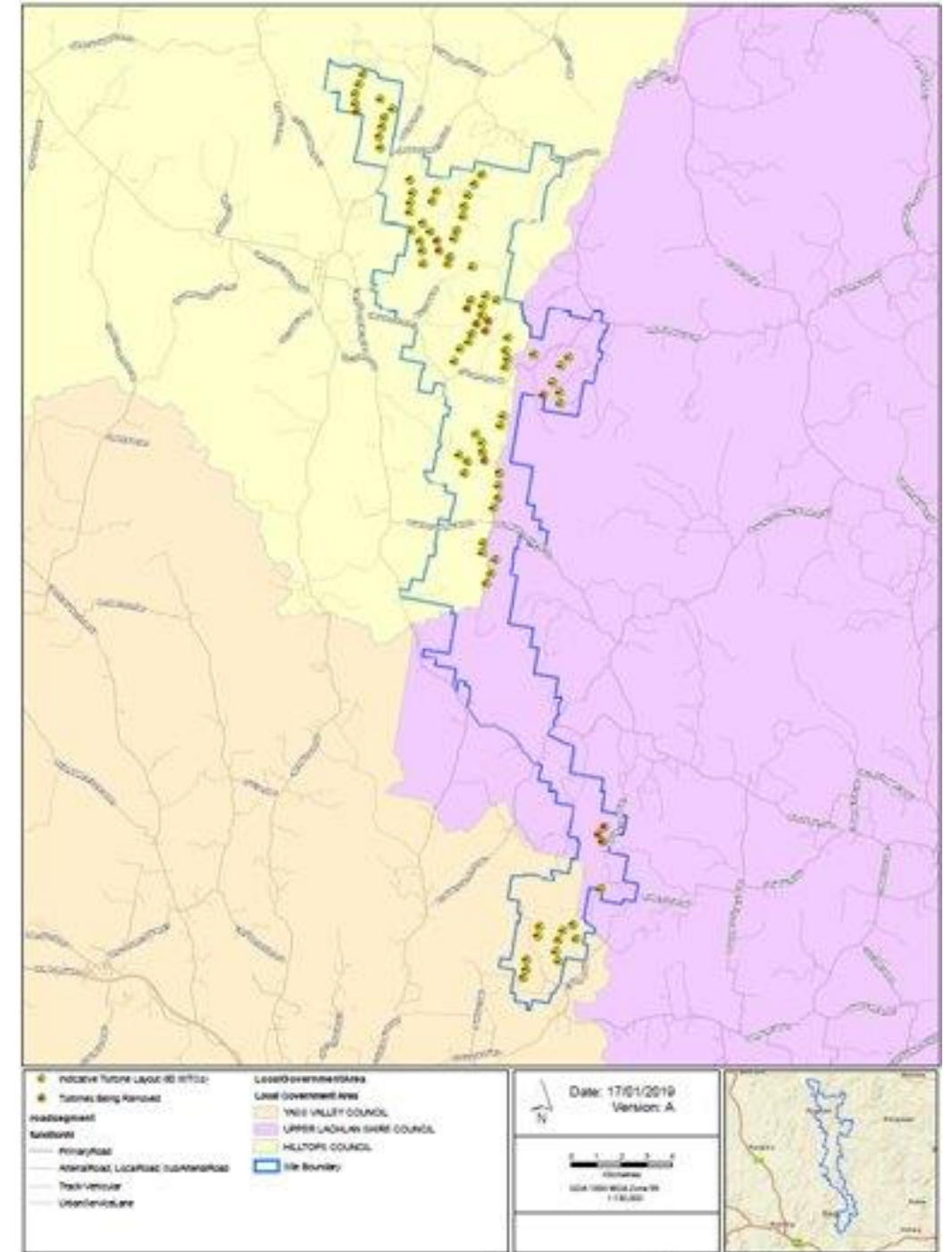


WHAT'S BEEN HAPPENING SINCE THE LAST CCC PREPARATION OF THE MODIFICATION

Since September 2019, our main focus has been undertaking the specialist studies necessary to support the modification application and continuing consultation with our stakeholders

We're modifying the Rye Park development consent to:

- Remove 12 wind turbines down to a maximum of 80. No changes are proposed to the location of these turbines
- Increase maximum tip height of 200m to enable newer and more efficient turbine models
- Change the layout of the internal access tracks, underground cabling and overhead transmission lines
- Remove one of the two operations and maintenance (O&M) facilities and two of the three substations
- Remove vegetation along roads requiring upgrade along on our preferred transport route



WHAT'S BEEN HAPPENING SINCE THE LAST CCC CONSULTATION WITH TECHNICAL STAKEHOLDERS

Early engagement with technical stakeholders is integral to ensure key issues are raised and resolved

Recent targeted engagement with technical stakeholders to re-establish relationships and discuss the proposed modification has included:

- November 2019 – January 2020: meetings with DPIE and OEH to discuss required road upgrades and assess ways to reduce subsequent vegetation removal
- January 2020: Councillor briefing session with Yass Valley Council
- February 2020: DPIE (Crown Land) meeting
- February – March 2020: Ministerial briefing sessions with DPIE
- March 2020: Councillor briefing session with Upper Lachlan Shire Council (pending confirmation with Council)



WHAT'S BEEN HAPPENING SINCE THE LAST CCC COMMUNITY ENGAGEMENT

Early engagement was undertaken to make people aware of the modification, project rationale, proposed changes and understand any key areas of concern for the community

- Drop in sessions were held in November 2019 in Boorowa, Rye Park and Yass to discuss the proposed modification and seek feedback on the project
- 1:1 meetings were held with host landowners, neighbouring properties and other interested community members
- December 2019 newsletter were distributed to 650 households
- 130 letters were sent to host landowners, neighbours, prior submitters, councils and local Members of Parliament

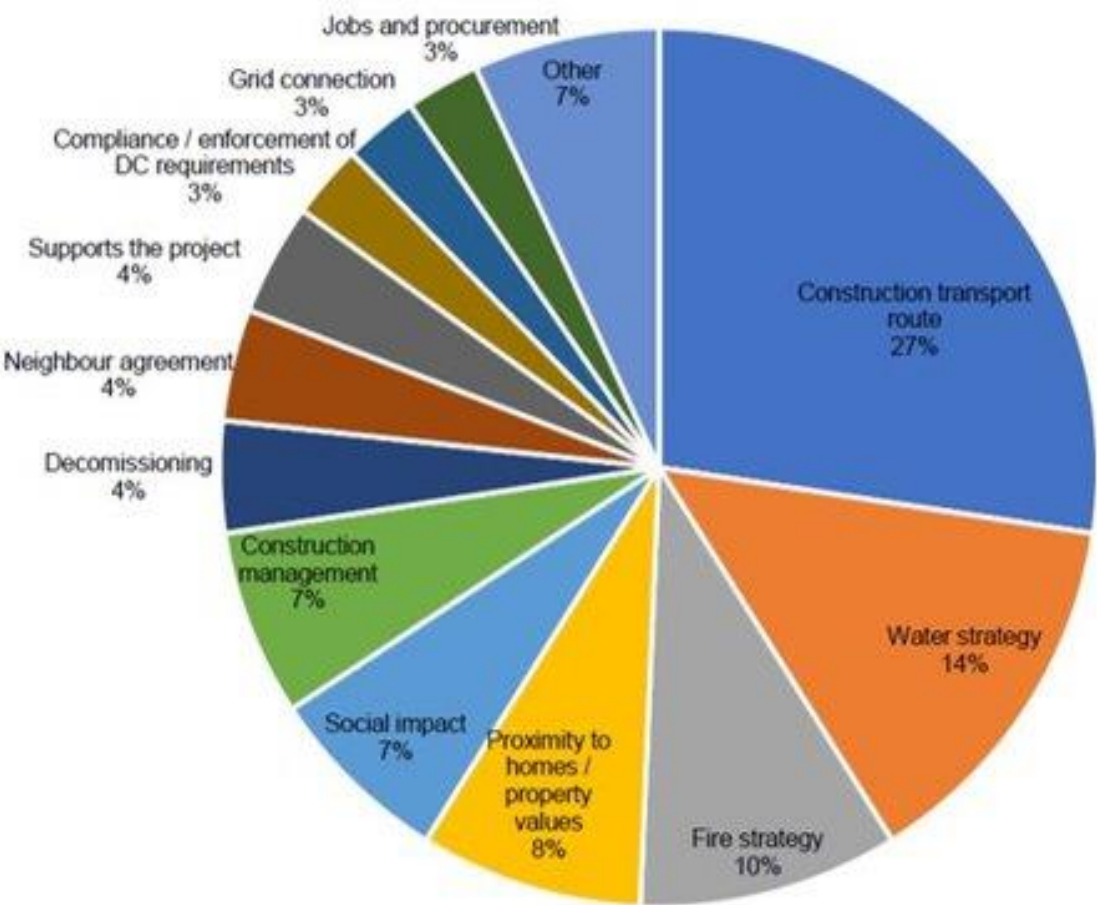
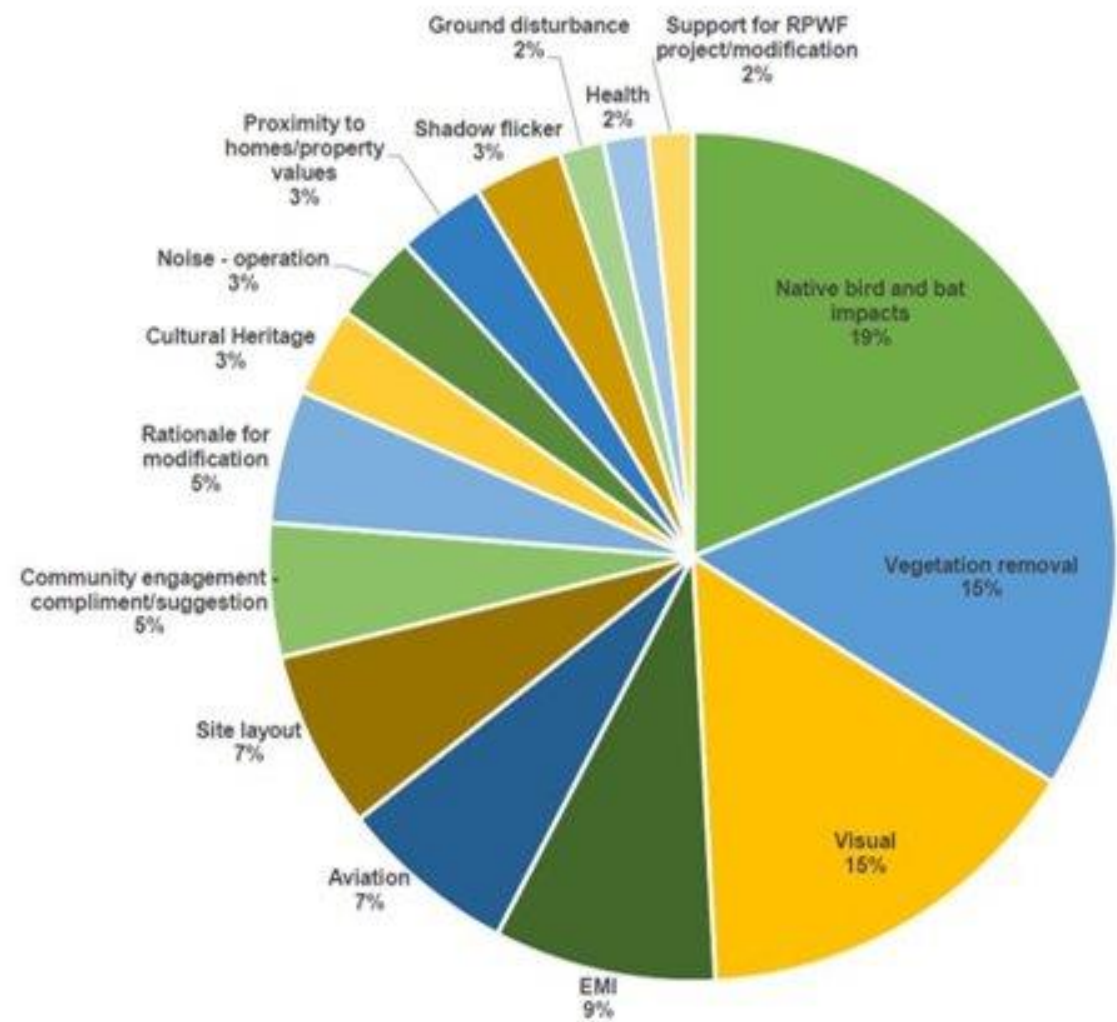


WHAT'S BEEN HAPPENING SINCE THE LAST CCC COMMUNITY ENGAGEMENT – KEY ISSUES RAISED



Feedback by topic (development consent / modification)

Feedback by topic (other aspects of the project)



Note: topics with only 1 comment each were grouped together as 'other'.

WHAT'S BEEN HAPPENING SINCE THE LAST CCC BENEFIT SHARING

Tilt Renewables is committed to sharing the benefits of the Rye Park Wind Farm with the local communities

Recent progressions on benefit sharing include:

- Upcoming meeting with Rye Park Progress Association
- Working with local schools

Benefit sharing proposed for the Rye Park Wind Farm includes:

- Around 250 jobs during construction and 10 jobs during long-term operations
- \$230,000 per year in community funding (VPA)
- Around \$3 million per year in direct payments to local landowners
- Preparation of a Benefit Sharing Plan, in collaboration with the Rye Park community, that will detail how additional programmes will benefit from the Rye Park Wind Farm



REASONS FOR THE MODIFICATION JUSTIFICATION

- Latest in wind turbine technology to create more renewable energy from fewer turbines, optimising the existing site, increasing generating capacity from 327MW to ~448MW (maximum capacity), enough to power around 240,000 homes per year
- Greater contributions to the Federal Government's renewable energy targets and the NSW target to reduce greenhouse gas emissions by 60% by the year 2050
- More thorough environmental assessments of the site, improving site knowledge and more detailed engineering assessments, improving constructability of the layout

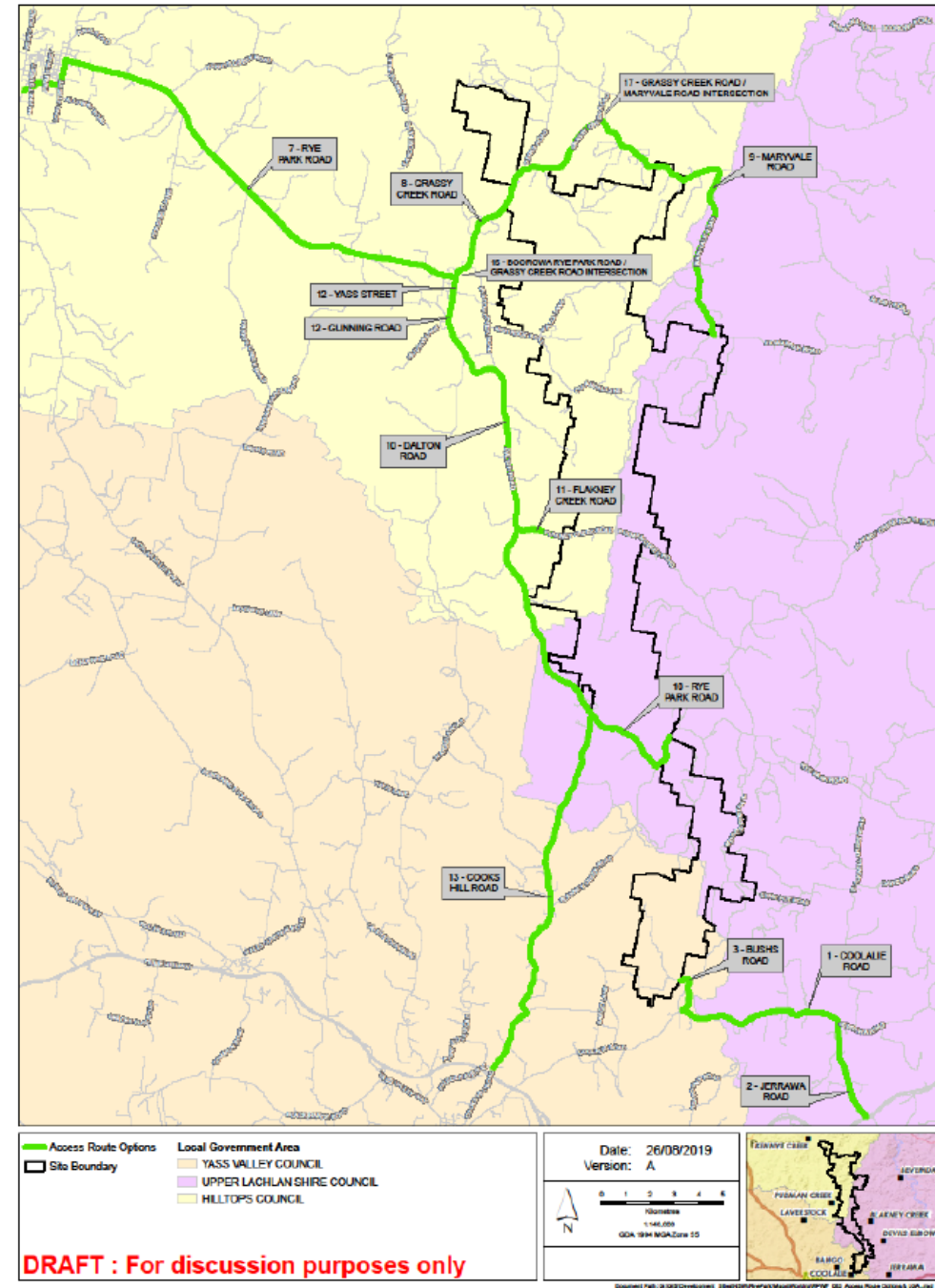
Changes to the project include:

- Increase in width of access tracks and underground cabling (resulting in an overall increase in site disturbance)
- Increase in tip height and rotor swept area
- Reduced development envelope
- Reduced underground cabling
- Reduced length of internal access tracks
- Reduction in O&M facilities and substations
- Optimising the design and alignment of the transmission line



PREFERRED TRANSPORT ROUTE CONSULTATION WITH COUNCIL & REQUIRED ROAD STANDARDS

- Approval for several transport route options in the development consent
- Consultation with councils in late 2019 to discuss requirements and considerations for road upgrades
- Road upgrade standard is defined in the Development Consent and EIS
- Road upgrade requirements specified by Council include:
 - Where possible, roads to be designed to follow existing road alignments to minimise impacts on vegetation and possible land acquisition
 - Council to help with any required land acquisition surrounding road reserves
 - Council to be provided with dilapidation surveys prior to construction commencing for areas not being upgraded



PREFERRED TRANSPORT ROUTE

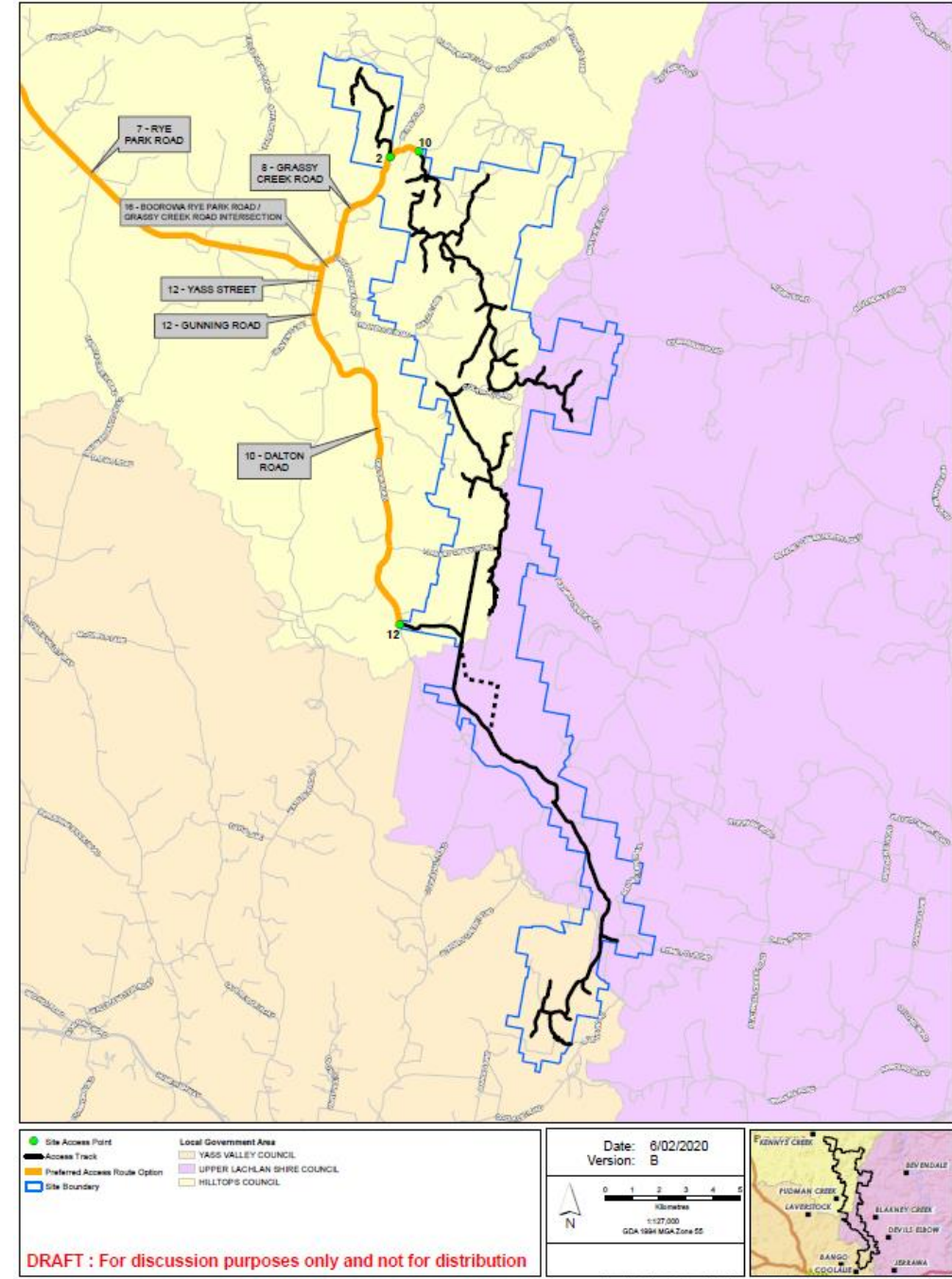
ROUTE SELECTED

The preferred transport route is based on consultation with Council, current road conditions and avoiding clearing of high quantities and more valuable vegetation

Preferred Route includes:

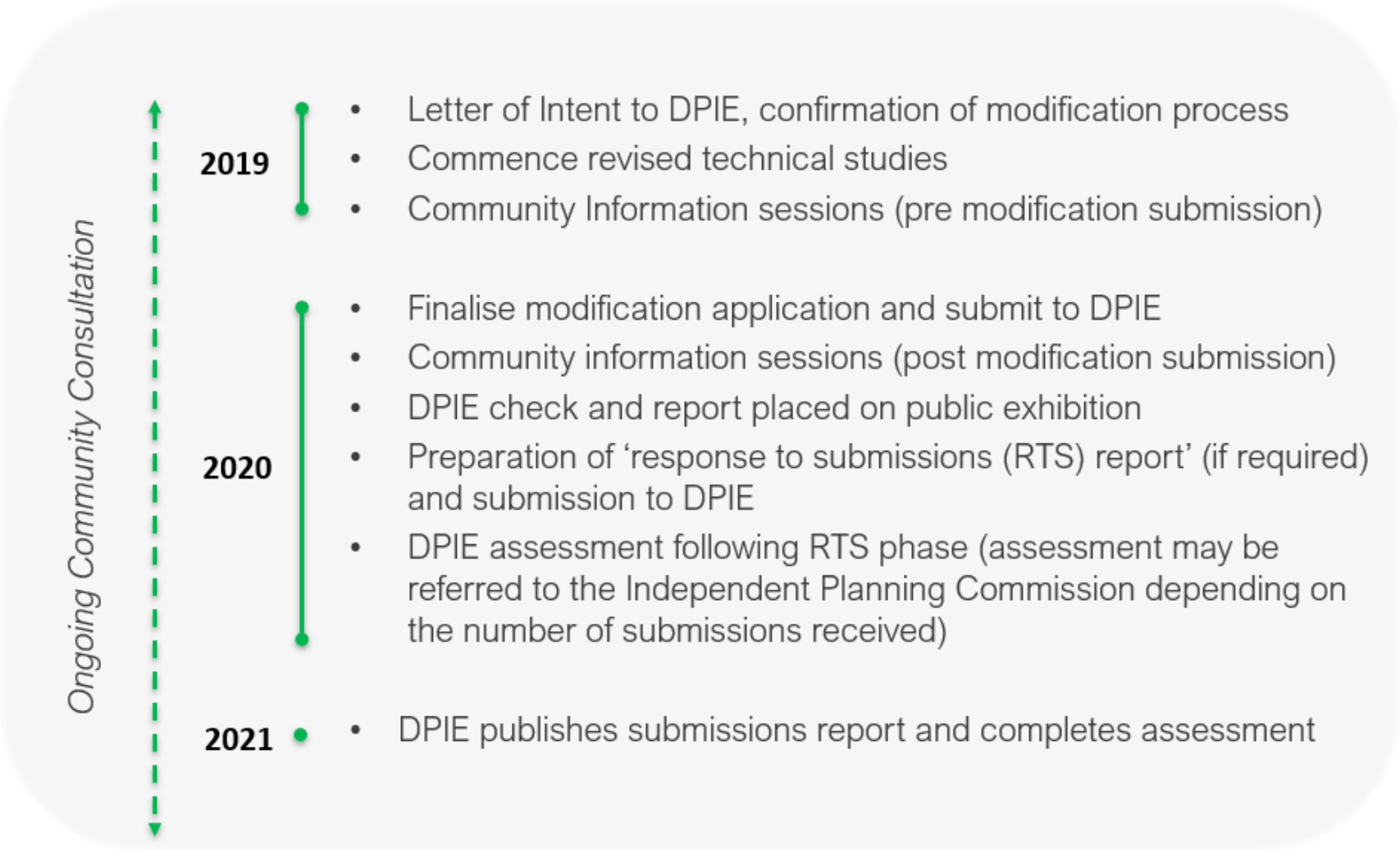
- Dalton Road (Rye Park)
- Yass Street (Rye Park)
- Rye Park Road (Boorowa / Rye Park)
- Gunning Road (Rye Park)
- Grassy Creek Road (Rye Park)
- Long Street (Boorowa)
- Dillion Street (Boorowa)
- Trucking Yard Road (Boorowa)

A workshop with Hilltops Council and BCD identified opportunities to have reduced road widening to minimise unnecessary loss of valuable native vegetation.



MODIFICATION PROCESS

STATUS



During the RTS phase, there will be an opportunity to write submissions and provide feedback on the project

The public consultation process is determined by DPIE though it is likely to be 1-2 months following submission

The modification application is required to set out the qualitative and quantitative (where possible) differences between the approved and modified project

- The modification assesses the change in impact from what was approved (92 turbine layout) to what is proposed (80 turbine layout)
- Each specialist study was reviewed for any substantive effect on the assumptions or conclusions or mitigation strategies proposed for the modification
- The last Environmental Assessments completed for the Rye Park Wind Farm project were undertaken in 2016 during the Response to Submissions (RTS) phase of the Environmental Assessment
- These assessments were based on a 109 turbine layout, however no additional assessments were undertaken against the approved 92 turbine layout
- Subsequently, assessment impacts were rebaselined against the 92 turbine layout to make a fair comparison from what was approved to what is proposed

Additional assessments include:

Aviation

Electromagnetic Interference (EMI)

Shadow Flicker

Operation Noise

Traffic and Transport

Heritage

BDAR

Operational Bird and Bat

Visual

Aviation was reassessed due to modification of turbine size and reduction in turbine numbers

- Landrum & Brown Worldwide (Australia) Pty Ltd prepared an Aeronautical Impact Assessment (AIA) for the revised layout of the RPWF
- The modified project will not infringe obstacle limitation surface (OLS), contingency procedures and will unlikely affect surveillance systems or lowest safe altitude (LSAT)
- The modified project is still outside clearance zones associated with navigational aids
- The assessment identified the modified project will have little to no impact upon local flying activities

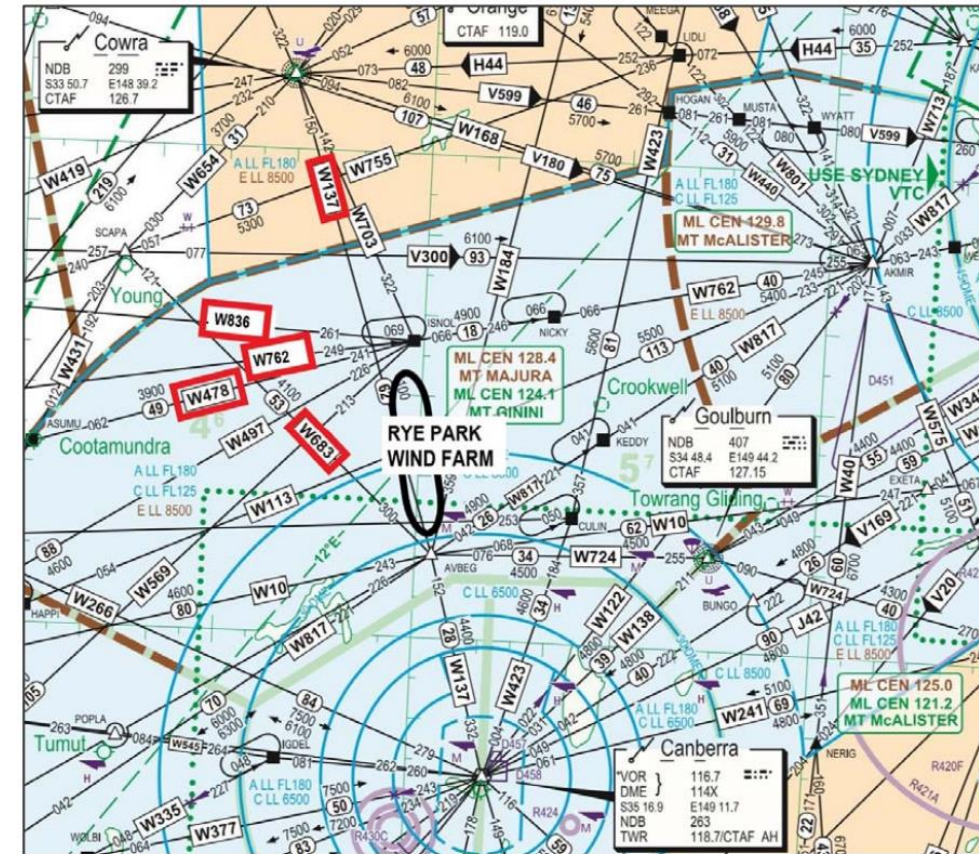


Figure 2: Air Routes and development site (AIP ERC L2 – 23 May 2019)

EMI was reassessed due to modification of turbine size and reduction in turbine numbers

- DNV GL prepared an EMI assessment for the revised layout of the RPWF.
- Compared to the 92 turbine layout, the modified layout is not expected to result in any increased impact to:
 - Nearby radiocommunication towers
 - Point-to-point links
 - Emergency services communications
 - Meteorological radar
 - Trigonometrical stations
 - Citizen's band radio communications; or
 - Satellite television and internet signals
- Consultation has commenced with single-to-multipoint link operators
- **No change to mitigation strategies warranted**

Shadow Flicker was reassessed due to modification of turbine size and reduction in turbine numbers

- DNV GL prepared a Shadow Flicker assessment for the revised layout of the RPWF
- In accordance with Condition 6 of the Development Consent, the predicted theoretical shadow flicker impact does not exceed 30 hours per year at any non-associated residences
- Compared to the 92 turbine layout, there are no more non-associated dwellings affected by above 0 hours/year of predicted theoretical shadow flicker (within 50 m of a dwelling)
- Compared to the 92 turbine layout, there are no more non-associated dwellings affected by more than 30 hours/year of predicted theoretical shadow flicker (within 50 m of a dwelling), exceeding the limits specified in the development consent
- Turbines to be off-white or grey to minimise potential for glare and reflection
- **No changes to mitigation strategies are warranted**



Operational Noise was reassessed due to modification of turbine size and reduction in turbine numbers

- Sonus undertook an environmental Noise Assessment for the revised layout of the RPWF
- The noise assessment was undertaken against one of the noisiest turbines on the market for a conservative assessment
- The 80 turbine layout is predicted to achieve the operational noise criteria at all residence in the vicinity of the wind farm, with the exception of a few residences
- With a reduced noise mode of the specific turbines, it is predicted the operational noise criteria can be achieved at all residences
- Construction noise and Corona and Aeolian noise have not changed since the approved project
- **We will comply with the existing conditions of the Development Consent with respect to noise**
- A final noise assessment will be undertaken once the final turbine model and site layout has been selected (after micro-siting)

Traffic and Transport was reassessed due to modification of turbine size, infrastructure layout, preferred transport route, reduction in access points and required road upgrades

- SMEC undertook a Traffic Impact Assessment for the revised layout of the RPWF
- Both the approved 92 turbine layout and proposed 80 turbines have assumed no onsite quarry is required and all materials will be sourced offsite
- No substantial change from the approved project regarding the total number of two ways trips
- Consultation is ongoing with Councils around the preferred transport route and required road upgrades
- After construction, operational transportation will be minimal
- A Traffic Management Plan will establish a procedure to manage traffic impacts during construction such as travel timings so adjustments can be made to minimise impacts



Heritage was reassessed due to modification of the development envelope and required road upgrades

- NGH Environmental undertook an Aboriginal and Cultural Heritage Assessment (ACHA) for the revised layout of the RPWF
- Changes to the modified layout and development envelope has resulted in impacts to additional areas that were not impacted in the approved layout
- Other areas that were previously impacted will no longer be disturbed under the modified layout
- Significantly increased efforts and more extensive surveys of the site have been undertaken during this assessment, which has influenced these findings
- **Mitigation measures are to avoid impacts where possible and salvage any potential archaeological finds**



BDAR was reassessed due to modification of the development envelope and required road upgrades

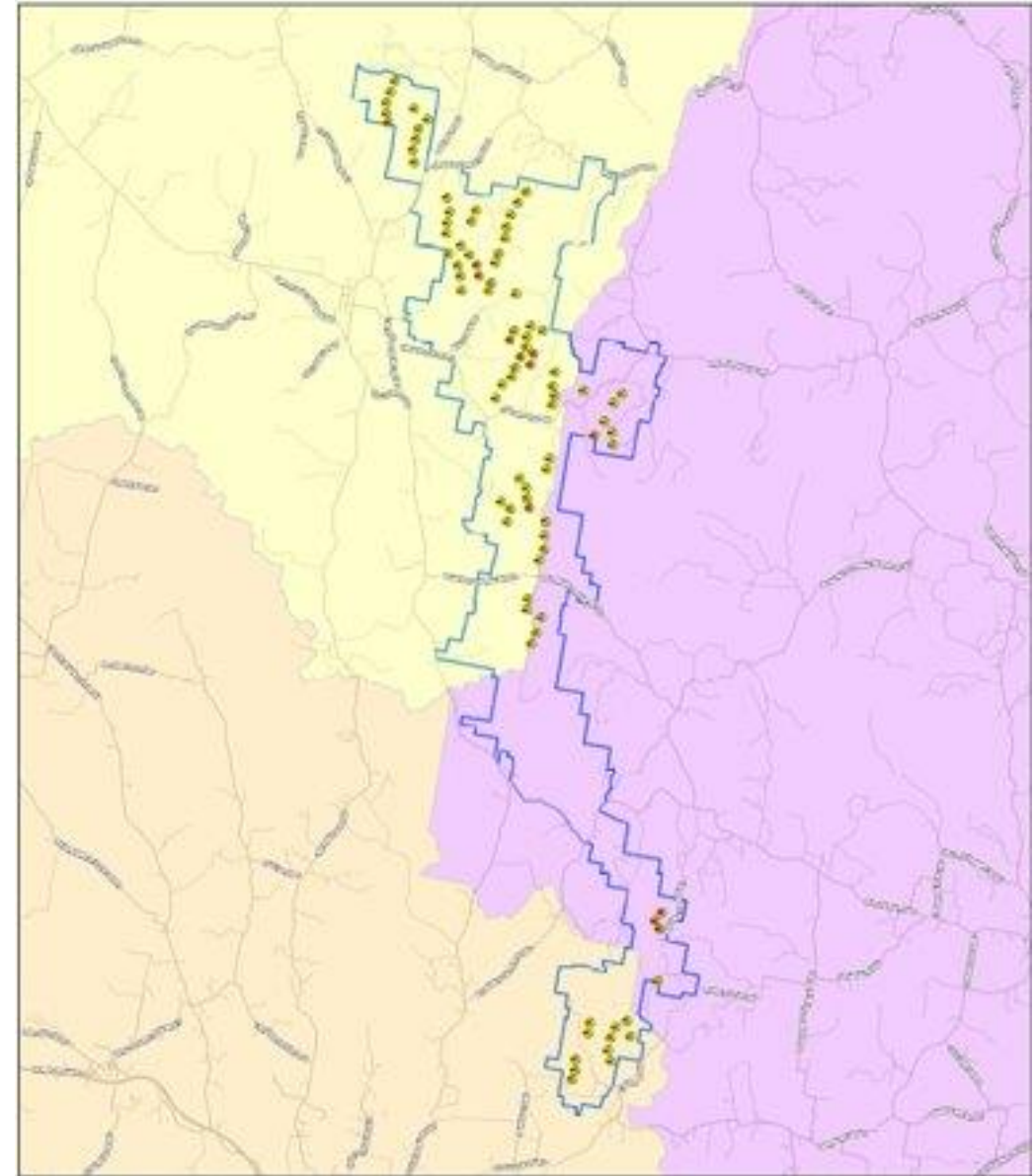
- Umwelt undertook a Biodiversity Development Assessment Report (BDAR) for the revised layout of the RPWF
- The indicative development footprint supports the following Plant Community Types:
 - PCT 289 Mugga Ironbark - Inland Scribbly Gum - Red Box shrub/grass open forest
 - PCT 335 Tussock grass - sedgeland fen - rushland - reedland wetland
 - PCT 350 Candlebark - Blakely's Red Gum - Long-leaved Box grassy woodland
 - PCT 351 Brittle Gum - Broad-leaved Peppermint - Red Stringybark open forest
- Following the application of avoidance and minimisation measures, the BAM assessment identified biodiversity credits required to offset the impacts of the project
- The Development Consent includes a threshold of 50.2ha of Box Gum Woodland and current findings indicate that this threshold will not need to change in the modified project.
- Compared to the approved project, there is an increased amount of vegetation clearing, however much of this is exotic and of low condition. This is predominantly due to larger cut and fill requirements for internal access tracks and public road upgrades which were not considered in the approved project.
- Where possible, Tilt Renewables have implemented avoidance and mitigation measures.

SPECIALIST STUDIES

OPERATIONAL BIRD AND BAT

Operational Bird and Bat was reassessed due to modification of turbine size and reduction in turbine numbers

- Umwelt undertook a bird and bat strike assessment for the revised layout of the RPWF
- Focus of the assessment was on the change in extent of collision impacts predicted for the modified project
- Increased rotor swept area (RSA) per turbine would increase the risk to bird species that fly above 30m
- For threatened species which rarely occur above 20m, the risk of blade strike as part of the modification is negligible
- No additional management strategies are required
- A Bird and Bat Adaptive Management Plan will be prepared prior to construction



Visual impacts were reassessed due to modification of turbine size and reduction in turbine numbers.

- Green Bean Design has undertaken a visual impact assessment for the revised layout of the RPWF
- The study was peer reviewed by Moir Landscape Architecture with the peer reviewer generally agreeing with the findings of the VIA
- Additional levels of wind turbine visibility is limited and largely confined to the wind turbine hubs and upper portions of the rotor blades/tips
- **Proposed modification is not considered to result in a magnitude of visual change that would significantly increase visual effect**

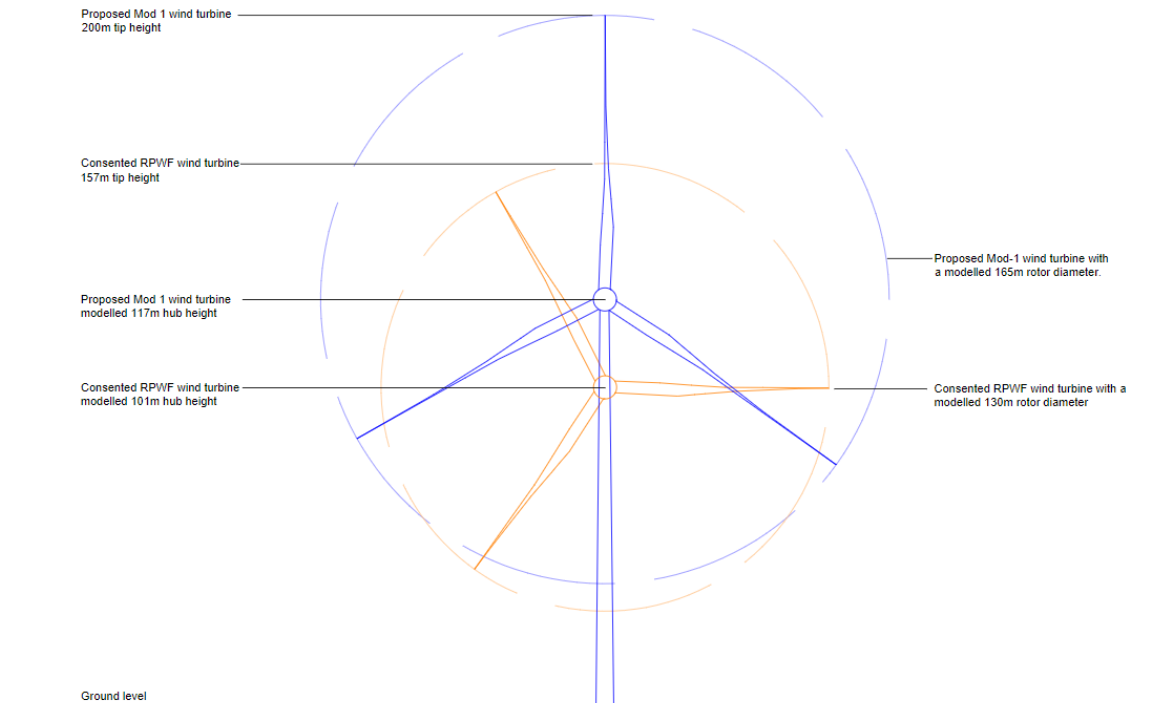




Photo location PM6 - View toward **consented** RPWF from Kershaw Street, Rye Park (157m tip height)



Photo location PM6 - View toward **proposed Mod 1** wind turbines from Kershaw Street, Rye Park (200m tip height)

Photomontage limitations

QUESTIONS

