

# Submission Cover Sheet

Fingerboards Mineral Sands Project Inquiry and Advisory  
Committee - EES

# 431

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Request to be heard?: No

**Full Name:** Leigh McKenzie

**Organisation:**

**Affected property:**

**Attachment 1:** Kalbar\_Fingerboar

**Attachment 2:**

**Attachment 3:**

**Comments:** Dear Inquiry and Advisory Committee members, This submission is in opposition to the proposed open cast mineral sands mine for Fingerboards in East Gippsland, Victoria. The reasons for opposing the mine are; - Impacts on biodiversity in the site identified for this proposal - The impacts of emissions to the atmosphere from the activity proposed. Specifically impacts of PM2.5. - Approving this proposal would be in direct contradiction to the EPAs Victoria State Government's Protocol for Environmental Management, 'Requirements for Protecting Air Quality - Emissions from Mining and Extractive Industries'. - Consumption of water from the Mitchel River Please see the attached document for the full submission.

Dear Inquiry and Advisory Committee members,

This submission is in opposition to the proposed open cast mineral sands mine for Fingerboards in East Gippsland, Victoria. The reasons for opposing the mine are;

- Impacts on biodiversity in the site identified for this proposal
- The impacts of emissions to the atmosphere from the activity proposed. Specifically impacts of PM<sub>2.5</sub>.
- Approving this proposal would be in direct contradiction to the EPAs Victoria State Government's Protocol for Environmental Management, 'Requirements for Protecting Air Quality - Emissions from Mining and Extractive Industries'.
- Consumption of water from the Mitchel River

### **Biodiversity**

This submission raises concern that the biodiversity assessment submitted by Kalbar Resources in their EES is inadequate. An independent assessment carried out by The Atlas of Living Australia (ALA) identified ~5 times more species than identified in the Kalbar Resources EES.

A further independent biodiversity assessment has been contracted by locals in the community using funding they gratefully received from the government to support their submission. Unfortunately the report is not prepared in time to be quoted in this submission, however once it is available, this submission asks the Inquiry and Advisory Committee members to take this into account, reducing the risk of approving a proposal based on unrepresentative EES. Numerous additional endangered and threatened species have been identified by the ecologists, not considered in Kalbar Resources's EES, or their subsequent assessment of offsets, scoping document. The inconsistency in these biodiversity assessments raises concern and reason to question the EES's understatement of its environmental effects, and demonstrates the EES has not met its requirements requested by the Minister<sup>1</sup>.

The Atlas of Living Australia indicates some of the species registered in Glenaladale:

- 948 (all species). Site - Mitchell River Walking Track, Iguana Creek.
- 504 (all Species) Site - Friday Creek Rd, Glenaladale.
- 448 (all Species) Site - Woorara Rd, Glenaladale
- 671 (all Species) Site - Providence Ponds, Perry river.
- A further, independent biodiversity assessment has been contracted, with the report having identified further endangered and threatened species, not accounted for in Kalbar's EES.

Kalbar Resources commissioned their wildlife survey, with a result that does not reflect the full extent of the biodiversity in the area.

- 178 flora species, comprising 132 native, 8 noxious weeds. EES 5.3.2. page 53. 76
- 117 terrestrial species comprising 108 natives, 9 introduced.
- 8 aquatic fauna. Page 55

Although these lists are not perfect for comparing, they are included in this submission to demonstrate the variation, and why the independent assessment is worth accounting for in your decision.

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<sup>1</sup> Victoria State Government (2018) "Scoping Requirements For Fingerboards Mineral Sands Project Environment Effects Statement", (URL: [https://www.planning.vic.gov.au/\\_\\_data/assets/pdf\\_file/0024/122199/Attachment-1-Final-Fingerboards-Mine-EES-Scoping-Requirements-March-2018-Updated-figure-.pdf](https://www.planning.vic.gov.au/__data/assets/pdf_file/0024/122199/Attachment-1-Final-Fingerboards-Mine-EES-Scoping-Requirements-March-2018-Updated-figure-.pdf)).

Kalbar Resources EES also refers to the quality of habitat as 'moderate to low'. As it is mostly on farmland with areas of disjointed native forest, this may be true in part. However, as there is presence of numerous endangered and threatened species, it is clearly at least 'adequate'. An open cast mineral sands mine will remove the existing habitat, reducing it. Approving projects that destroy habitat like this is the reason these species are endangered and threatened. I understand the applicant offers to purchase offsets to address this environmental harm, however these offset sites are existing habitats directly adjacent to the project area, rather than creating additional habitat to balance what they are removing, meaning the proposal will result in a net decrease in habitat for these endangered and threatened species.

### **Emissions of PM<sub>2.5</sub>**

This submission focusses on PM<sub>2.5</sub> as it is known to cause harm to human health and is difficult to control. PM<sub>2.5</sub> are particularly deadly, with a 36% increase in lung cancer per 10 µg/m<sup>3</sup> as it can penetrate deeper into the lungs<sup>2</sup>. Worldwide exposure to PM<sub>2.5</sub> contributed to 4.1 million deaths from heart disease and stroke, lung cancer, chronic lung disease, and respiratory infections in 2016<sup>3</sup>. The ability to suppress emissions of PM<sub>2.5</sub> is limited in due to the fineness of the particle size. This submission raises concern for the impacts of these emissions to residents, surrounding above ground horticulture, and protected and endangered habitats and species identified in the EES. This submission raises concern that the emission of PM<sub>2.5</sub> from this proposal will cause uncontrollable, unmitigated environmental damage.

### **Contradiction with EPA's Victoria State Government's Protocol for Environmental Management**

Approving this proposal would be in direct contradiction to the EPA Victoria State Government's 'Requirements for Protecting Air Quality - Emissions from Mining and Extractive Industries'. This Protocol for Environmental Management is an incorporated document of the State environment protection policy (Air Quality Management) 2001 (SEPP AQM). It supports the interpretation of SEPP (AQM) and sets out the statutory requirements for the management of emissions to the air environment arising from activities undertaken in the operation of mining and extractives sites. Proposals requiring an EES (this proposal) are required to be in accordance with this Protocol<sup>4</sup>. In accordance with the Policy Principles, consideration must be given to the waste hierarchy where avoidance of emissions is the primary aim and is preferable to treatment and discharge of wastes. The wastes hierarchy as set in the Environment Protection Act (1970) and SEPP (AQM) states that wastes should be managed in accordance with the following order of preference: 1 avoidance; 2 reuse; 3 recycling; 4 recovery of energy; 5 treatment; 6 containment; 7 disposal. The EES makes it clear this proposal will emit PM<sub>2.5</sub>, leaving it out of accordance with the PEM. This submission urges the Inquiry and Advisory Committee to act in accordance by avoiding these emissions by opposing this proposal.

This submission urges the Inquiry and Advisory Committee members to reconsider carefully if approving this proposal as it directly contradicts the State of Victoria's agenda on biodiversity and the Protocol of Environmental Management 'Requirements for Protecting Air Quality - Emissions

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<sup>2</sup> Ole Raaschou-Nielsen; *et al.* (2013) "Air pollution and lung cancer incidence in 17 European cohorts: prospective analyses from the European Study of Cohorts for Air Pollution Effects (ESCAPE)", *The Lancet Oncology*, 14 (9): 813–22. doi:10.1016/S1470-2045(13)70279-1. PMID 23849838. Particulate matter air pollution contributes to lung cancer incidence in Europe.

<sup>3</sup> Health Effects Institute (2018) "State of Global Air/2018: A Special Report On Global Exposure To Air Pollution And Its Disease Burden".

<sup>4</sup> EPA, State Government of Victoria, 'Protocol for Environmental Management: State Environment Protection Policy (Air Quality Management) Requirements for Protecting Air Quality - Emissions from Mining and Extractive Industries', page 3 (URL: <https://www.epa.vic.gov.au/about-epa/publications/1191>).

from Mining and Extractive Industries' democratically adopted by the State Government of Victoria, approving a proposal which contradicts the government's own code of practice.

### **Consumption of Water**

The proposal will initially require 3GI of water annually. However, Kalbar Resources explains their production rate as 'A gradual increase in production is proposed following commencement of mining and commissioning of the WCP. The plant will initially commence at a rate of 500 t/hr and increase to a design capacity of 1,500 t/hr or 12 Mt/year'<sup>5</sup>. The consumption of water provided in the EES does not appear to account for this increase in production, raising concern for this submission that it has not represented its full impact on water.

### **Assessment of the Project Area**

Allowing the compulsory acquisition of private land to be used by the mine for infrastructure that is located outside the mining project boundary for: water pipelines, bore pumps, bore field, roadworks, new powerlines, easements, rail siding and vegetation removal. Why wasn't this part of the mine project area?

In conclusion, this submission opposes the proposal for the Fingerboards Mine, East Gippsland, Victoria. The opposition is due to concern that the EES has not accounted for the full impact of its proposal, including its impacts on biodiversity, emissions of PM<sub>2.5</sub>, contradiction with EPAs Victoria State Government's Protocol for Environmental Management, consumption of water, and the project area assessed. Approving projects responsible for environmental and human health harm is not to be taken lightly. Other mining sites have not seen the controls and promises of minimal harm come to fruition. Why would this proposal be different? Are there different governance and regulation controls in place for this proposal?

Best regards and thank you for your consideration.

Leigh McKenzie

(MSc Environmental Management)

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<sup>5</sup> EES, Main report, Overview. Chap 3, Page 3-21 (URL <https://www.water.vic.gov.au/water-reporting/outlook>).