

Response to Public Exhibition Hunter Valley North and South Open Cut Coal Continuation Project Environmental Impact Assessment

22/02/2023

Hi

My name is Jayden Pan.

1 INTRODUCTION

I have been a resident of NSW my whole life living in the Central Coast, Newcastle and greater Sydney regions of this great state we call home. I have degree in Environmental Science and Management from the University of Newcastle, and have been working as an environmental specialist in the construction, rail, waste and mining industries all around the country for 4 and a half years. In addition I have been a proud volunteer of the NSW Rural Fire Service for the past 9 years, and have been awarded 2 medals for my service to the state and the diverse environment and communities that are found within.

I would like to voice my opposition to this project due to the cumulative impacts of carbon emissions on climate change and the ongoing impact of extreme weather events as a result. I would also like to point out the economic context of the Hunter Valley's future following a transition towards a renewable energy zone in the form of the Hunter-Central Coast Renewable Energy Zone.

These are my reasons.

2 SCOPE 3 EMISSIONS – THE ELEPHANT IN THE ROOM

Within section 9.3.2 the EIS has listed the predicted the scope 1, scope 2 and scope 3 greenhouse gas emissions of this project in table 9.3. The combined total of scope 1 and 2 emissions over the life of the project (2023-2050) total to 35 million tonnes of CO₂-equivalent (CO₂-e). However, the nature of climate change being an issue that affects us as a planet, as opposed to individual countries and regulatory authorities, scope 3 (ie the carbon emitted during the burning of the coal) should not have been excluded from this impact assessment process, especially when discussing the environmental impacts of a thermal coal mine. As stated in table 9.3 of the EIS, scope 3 emissions total to 1.17 billion tonnes of CO₂-e, making up a whopping 99.7% of greenhouse gas emissions directly related to this project, and are completely unaccounted for in section 9.4: Mitigation Measures and Abatement. (EMM, 2022)

While I would like to recognise the reasons behind the exclusion of scope 3 from the framework due to the potential to double count carbon emissions, however, we are one planet that shares the same atmosphere, and this project will otherwise still add another 1.2 billion tonnes of CO₂-e emissions into a world regardless of where it is exported to. This comes at a time where alternative, less carbon emission intensive fuel sources exist and are often viable and cheaper.

According to Table SPM.2 of the IPCC Sixth Assessment Report (IPCC AR6) Summary for Policy Makers, we have 300 Gt CO₂-e of estimated remaining carbon budget to prevent the warming of the climate greater than 1.5°C (from the start of 2020) (IPCC, 2021). This project alone would consume 0.4% of this budget. While this may not seem like much, this is a relatively run of the mill coal mine in an area full of other mines and fossil fuels projects.

The up incoming NSW EPA climate change policy states that “The EPA’s obligation to consider matters listed under section 45 (of the POEO act 1999) extends to our regulatory decisions relating to climate change.” Section 45 includes matters relating to:

- “pollution caused (or likely to be caused) and the likely environmental impact
- practical measures for preventing, controlling, abating or mitigating pollution
- practical measures for protecting the environment from harm as a result of that pollution.” (NSW EPA, 2023)

The most practical measure of addressing the aforementioned matters with regards to scope 3 greenhouse gas emissions, is to not release its pollutants (CO₂-e), through burning coal, by not mining it in the first place. This will leave the stored carbon within the coal seam where it currently exists in solid form and presents minimal risk to the environment.

Given the critical nature of humanity to lessen its carbon emissions as soon as possible and the impact the HVO mine being put into proper perspective, this project cannot possibly be allowed to go ahead.

3 CORPORATE RESPONSIBILITY AND THE JOINT VENTURE PARTNERS

HVO is of course a joint venture between fossil fuel giants Yancoal and Glencore. The following sections looks into their corporate targets as moguls of the fossil fuels industry.

3.1 YANCOAL AND CARBON CAPTURE – A FLAWED MITIGATION MEASURE

As stated in the Yancoal 2020 and 2021 ESG reports, the internal Taskforce on Climate Related Financial Disclosures (TCFD) has left the recommendation to “Disclose Scope 1, Scope 2, and if appropriate, Scope 3 greenhouse gas (GHG) emissions, and the related risks” only partially addressed. Both reports have had the same copy and paste response of saying “We disclose our Scope 1 and 2 emissions on an annual basis.” As per relevant legislation, (Yancoal, 2020) (Yancoal, 2021) and “We do not report on Scope 3 emissions associated with the downstream consumption of our coal products as this is not within our operational control”, (Yancoal, 2018) (Yancoal, 2019) (Yancoal, 2020) (Yancoal, 2021) and state Yancoals continued support of “research into technologies that will reduce GHG emissions from the downstream consumption of our products (scope 3)”. This includes a commitment to “support innovation and investment in Carbon Capture, Utilisation and Storage (CCUS)” (Yancoal, 2019) (Yancoal, 2020) (Yancoal, 2021), (EMM, 2022).

Yancoal's aforementioned TCFD recommendation being left partially addressed suggests its support of CCUS technology and appropriate scope 3 emissions reporting has yet to produce any results or progress since at least the year 2020 (3 years ago). Carbon capture has been widely regarded in the scientific community as a complete failure, as not a single carbon capture and storage (CCS) project has achieved its emissions reduction targets or become economically viable in doing so.

The Gorgan Gas Project (GGP) in WA has the worlds largest carbon capture and storage project. The project was approved under the condition that it will capture all carbon emissions related to the project, and as a minimum "implement all practicable means" to bury at least 80 per cent of its emissions. This project is regarded as a complete failure as it is currently only able to capture 33% of the project emissions. In addition the CCS project began operation 3.5 years after LNG production began, (Milne, 2021) at a cost of \$3.1 Billion and the technology has not matured since studies and research into the CCS project began within the GGP 25 years ago in 1998 (Chevron Australia Pty Ltd, 2020). As of 2022 GGS has captured approximately 7 million tonnes of CO₂, again one third of its legally required amount. (Chevron Australia Pty Ltd, 2022)

The Gorgan Gas project case study shows that carbon capture and storage technology is a failed venture that has never matured over 25 years onward despite substantial resources made available.

To suggest for yancoal and its 51% stake in HVO to tout its continued support of flawed CCUS technology in hope of sequestering 1.2 billion tonnes of CO₂ is a pipe dream to say the least, and sounds more like greenwashing buzzwords used purely to approve more coal mines.

Again, the best mitigation measure and carbon storage method is by not mining and burning fossil fuels.

3.2 GLENCORE – SNEAKY CORPORATE SHENANIGANS OR BEACON OF HOPE?

Glencore has announced a strategy to limit global warming by 1.5°C by a 50% reduction of total carbon emissions (including Scope 1, 2 and 3) by 2035 and net zero emissions by 2050, in section 2.2 of the EIS (EMM, 2022) is a welcome sign at face value, however its strategy towards this pathway includes a responsibly managed decline in its coal portfolio, and to responsibly realize the value in its existing assets, so it can make a meaningful contribution to global climate change goals, as stated in section 2.4 of the EIS (EMM, 2022).

This position statement is effectively saying, we can that: by mining and selling more coal (or potentially even the coal mines themselves), Glencore can use that money on combatting climate change. To suggest that adding 1.2 billion tonnes of CO₂-e will help fight climate change is the definition of an oxymoron. Under this wording, if/when Glencore divests all its coal operations, it could significantly reduce its scope 3 emissions footprint, however the planet itself will still have the same amount of coal mines operating well into the future. HVO is an example of exactly that, should it be allowed to operate until 2050.

If Yancoal and Glencore were serious about its supposed objectives of net zero and carbon capture objectives, the "do nothing" approach would by far be the best possible outcome in emissions reductions objectives.

4 HUNTER REGIONAL PLAN – A CONFLICTING INTEREST

The Hunter Regional Plan 2036 was published by the DPE in 2016 and details four main goals for the Hunter region, with the aim of creating:

- the leading regional economy in Australia;
- a biodiversity-rich natural environment;
- thriving communities; and
- greater housing choice and jobs.

The report was published in 2016, 3 years prior to the unprecedented 2019-2020 bushfire season, aka the Black Summer and its associated ecological catastrophe. This natural disaster saw the death of approximately 3 billion animals, saw 24.3 million hectares habitat destruction across the continent and claimed 483 human lives (34 through flame inundation and 429 through respiratory failure as a result of poor air quality associated with smoke inhalation) and cost the Australian economy equated to approximately \$10 billion in disaster relief and medical costs, as stated in the Royal Commission (Mark Binskin, 2020). Overwhelming scientific consensus suggests that the intensity, and duration of the fire season is was heavily influenced by climate change. It is accepted that climate change also influenced many factors that exacerbated the fire season, the drought that proceeded the fire season, the intensity of the Indian Ocean Dipole Negative event at the time and the delayed Northern Australian wet season.

The impacts of the fire season and its connection to climate change are well documented within the Royal Commission (Mark Binskin, 2020). However, in my capacity as an experienced fire fighter, I visited the Hunter Valley on multiple occasions during 2019 and 2020, fighting the Gospers Mountain Complex and Kerrys Ridge fires in the Singleton and Muswellbrook LGAs, amongst many other incidents all over NSW. I was also deployed in an asset protection role for the defense of critical infrastructure such as the Mangrove Creek Dam, Mangrove Creek Weir, Warragambah Dam and the Eraring Power Station. I witnessed first hand the social and ecological destruction of the fires, reducing homes and habitat alike to ash within the Hunter Valley and the wider communities and environments of NSW. In addition, on my associated deployments throughout the state I witnessed the severe economic, social and mental implications of the drought upon the citizens of modern New South Wales.

To say that the HVO coal mine's total associated emissions of 1.2 billion tonnes of CO₂-e and associated cumulative impacts on global climate change will achieve the "aim of creating" a "biodiversity-rich natural environment" and "thriving community" within the Hunter region, is an oxymoron, to say the very least. In addition, again, given the extensive and far reaching impacts of climate change, lining this EIA up to assess the local community as a whole is arguably not adequate.

5 JOHN BARILARO – A LEGACY

Government departments and associated publications they produce can often be swayed based on political direction and the minister responsible, this can particularly be said for reports that do not have associated regulatory requirements.

This can be said for the Strategic Statement of Coal Exploration and Mining in NSW report referenced in section 2.1.2 of the EIS (EMM, 2022) as a justification of strategic context for the HVO mine.

The Minister, and only signatory of this strategic statement, is the disgraced former politician, John Barilaro.

As leader of the NSW Nationals Party at the time, John is also responsible for threatening to dissolve the NSW Liberal National coalition in attempt to block policy reform aimed at protecting the Koala, (Alexandra Smith, 2020), an endangered species under the EPBC act 1999. This shows his Johns disregard for environmental management.

After resigning from government in 2021, John Barilaro is also renowned for his involvement in the Jobs for Boys scandal in the same year, when he was awarded a high paying job role through a doctored process. As a result he was referred to the NSW Independent Commission Against Corruption. While being questioned about these events he went on to attack a cameraman and causing a lost time injury. This shows Johns actions are not in the public interest and in poor faith of the people of NSW while sitting in a position of power. The ICAC investigation is continuing at the time of this writing.

With these two examples, they show that John acted in poor faith and against the public interest of the people and environment within NSW. While John might not be the author, the Strategic Statement of Coal Exploration and Mining in NSW report which bears his direction and only his signature, can, and should be held subject to intense scrutiny given the points made above regarding the exclusion of scope 3 emissions from any assessment process.

The report states that “Ending or reducing NSW thermal coal exports while there is still strong long-term global demand would likely have little or no impact on global carbon emissions. Most coal consumers would be likely to source their coal from elsewhere, and much of this coal would be lower quality compared to NSW coal. Reducing demand for thermal coal in line with the Paris Agreement by progressively replacing coal-fired electricity with cleaner energy sources, as has been seen in Europe, will be more effective in reducing global emissions than reducing NSW coal supplies.” (Barilaro, 2020). This statement alone shows that the focus of combatting climate change in the coal industry is to pass the buck onto end users as opposed to work with the global community to reduce global emissions through innovation of new and emerging technologies that have been neglected for many years now.

The statement “The NSW Government is taking a responsible approach to the global transition to a low carbon future, consistent with Australia’s ambition under the Paris Agreement” and the aforementioned paragraph runs in contradiction to the IPCC’s recommendation of not allowing any further fossil fuel projects to be approved (IPCC, 2021).

6 THE DO NOTHING APPROACH – HUNTER VS THE FUTURE

One of the main strategic context objectives of the HVO continuation project is its associated economic development for the Hunter region.

The argument can be made that the Hunter region is about to undertake significant economic development regardless of coal mine operations through the Hunter Central Coast Renewable Energy Zone. The HCCREZ is a major energy infrastructure project that seeks to build:

- 24 solar energy projects,
- 13 onshore wind and
- 7 offshore wind energy projects,
- 35 large-scale batteries, and
- 8 pumped hydroelectric dams.
- All associated high voltage transmission towers to connect to the Australian grid

This coupled with the future Hunter Valley hydrogen hub, Kurri Kurri Power Station Hydrogen Conversion Project, Waratah Super Battery Project, the neighboring Central West Orana REZ and ongoing rehabilitation of HVO (should it close in 2025), would produce significant economic development and reduce the requirement of extending the life of HVO to achieve economic prosperity. This however would require the proactive engagement of the local community and the current workforce at HVO to transition them away from coal mining into other industries, however is very achievable.

The international transition to a clean energy future has also driving up significant demand of critical minerals such as cobalt, copper, lithium, nickel and vanadium these minerals can be found in abundance in the western regions of NSW and in neighboring states. The establishment of fly in fly out hubs to connect regional towns to the Hunter, Newcastle and Sydney has the potential to transition the aforementioned coal mining jobs into sustainable metalliferous mines throughout the country, similar to that of other regions like Perth, the Pilbara and the Gold fields, Brisbane and the Bowen Basin, Townsville and Mt Isa, among many others.

The border closures associated with the covid pandemic and the rise of remote working capabilities has highlighted a skills shortage in many regions including the Hunter Valley, suggesting the economic situation of the hunter valley may not be as dire as originally stated.

7 CONCLUSIONS

The HVO mine will not be in the public interest of being approved, as the wide- and far-reaching implications of scope 3 emissions have been completely overlooked. The environmental destruction and resultant economic impacts climate change will bring by far outweighs the economic benefits of this project. The operators are clearly using buzzwords and tricky corporate policy to maximise profits and lessen risk while absolving themselves from any repercussions while us as residents of this planet have to bear the brunt of their irresponsibility.

At the very least the EIS should be amended to include the assessment of scope 3 emissions against relevant legislative requirements including the IPCC Summary for Policymakers (IPCC, 2021) and the up incoming NSW EPA Climate change policy.

Environmental impacts resulting to the cumulative impacts of carbon emissions (again including scope 3), a rapidly decreasing carbon budget, and flawed strategic context of the project should be taken into account within an amended EIS. Amendments should include, but not be limited to the impacts of: increased frequency and intensity of extreme weather events, contribution to natural disasters, rising sea levels, coral bleaching events, food and water security and the associated economic cost of dealing with aforementioned impacts.

We as residents of this community, state, country and planet, owe it to ourselves to protect one and other from harm and risk. As a result this project should not be allowed to continue and should close under the current closure date of 2025.

8 RECOMMENDATIONS

Based on what I have mentioned in this report, I believe the following recommendations should be implemented.

Assess scope 3 greenhouse gas emissions (along side Scopes 1 and 2) under the legislative framework of the IPCC 2021 Summary for Policymakers, and the NSW EPA Climate Change policy, and any other relevant policy.

Assess the cumulative impacts of Scope 3 emissions will have on climate change and the increased risk of extreme weather events and all other climate change risks should a warming scenario exceed 1.5 and 2°C.

Include an economic cost impact of dealing with a warming scenario of 1.5, 2 and >2°C within the Social Impact Assessment section.

Compare the three above assessments to a do nothing scenario and form a EIA recommendation or mitigation measure of both environmental and economic factors.

I hope this has provided context into the seriousness implications of the approval of this project.

9 REFERENCES

- Alexandra Smith, L. C. (2020). *Nationals hold crisis meeting before morning showdown*. Sydney: Sydney morning Herald.
- Barilaro, J. (2020). *Strategic Statement of Coal Exploration and Mining in NSW*. Sydney: NSW Government.
- Chevron Australia Pty Ltd. (2020). *Gorgon Project Carbon Dioxide Injection Project Low Emissions Technology Demonstration Annual Report 1 July 2019 - 30 June 2020*. Perth: Chevron Australia.
- Chevron Australia Pty Ltd. (2022). *Fact Sheet Gorgan Carbon Capture and Storage*. Perth: Chevron Australia Pty Ltd.
- EMM. (2022). *Hunter Valley Operations Continuation Project Environmental Impact Statement* . St Leonards: EMM.
- IPCC. (2021). Summary for Policy Makers. *Climate Change 2021: The Physical Science Basis*, 3-32.
- Mark Binskin, D. A. (2020). *Royal Commission into Natural Disaster Arrangements* . Canberra: Governor General of the Commonwealth of Australia.
- Milne, P. (2021). Time's up on Gorgon's five years of carbon storage failure. *Boiling Cold*.
- NSW EPA. (2023). *NSW EPA Climate Change policy*. Parramatta: NSW Environment protection Authority.
- Yancoal. (2018). *2018 ESG Report*. New South Wales: Yancoal.
- Yancoal. (2019). *2019 ESG Report*. New South Wales: Yancoal.
- Yancoal. (2020). *2020 ESG report*. New South Wales: Yancoal.
- Yancoal. (2021). *2021 ESG report*. New South Wales: Yancoal.