

SUBMISSION RELATING TO REVISED SANTOS SUBMISSION

The “revised” **Santos** submission includes new modelling and suggests gas could be produced more cheaply at the site than had been estimated. They claim the project will reduce gas prices in the NSW, and the economic and employment benefits will be greater than previously thought.

The new economic evidence is **substantially different** to what it had submitted previously, and that indicates that whatever **Santos** presents requires close scrutiny and lacks credibility.

There is no economic argument for this project except for the benefit of Santos and its supporters. Santos is a member of the east coast gas export cartel. Australia has more than ample gas already and besides, the concept of gas being a transition energy source is *no longer a valid argument*. Renewables already do the job and are increasingly doing it better.

Santos’s updated assertion, based on modelling by consultants **ACIL Allen**, that the project will reduce gas prices for consumers and businesses appears at odds with evidence to the commission by **David Kitto**, the director of the **NSW Department of Planning, Industry and the Environment**.

Kitto told the hearings the project was relatively small and the department had not claimed it would reduce gas prices.

Opposition to the project has come from the **Institute for Energy Economics and Financial Analysis**, which found gas from Narrabri would on average cost **more** than from other fields.

Former chief scientist **Penny Sackett** called for the plan to be rejected as it was at odds with the Paris agreement and a state target of cutting emissions to net zero by 2050. Gas is often described as having half the emissions of coal, but recent studies have suggested it could be comparable to coal. The cost of dealing with safety and the aftermath of a short term industry such as CSG are a significant burden and long lasting.

Some other examples of the inadequacy of the Santos submission:

Produced Water Spills: *Page 28, 9.2.8 Risk to Aquifers*. Reference is made to “successful operations in Queensland.”

This assertion is open to dispute. The 2019 Underground Water Impact Report by the Department of Natural Resources, Mines and Energy (Queensland) found hundreds of rural water bores affected by CSG in the Surat Basin.

The Queensland Audit Office tabled a report No.12 in 2019- 2020 that criticised state regulators in the CSG industry, particularly noting failures in the data gathering, oversight and transparency.

On *Page 28, 9.2.8 Risk to Aquifers From Loss of Containment*. The claim is also made that “CSG water is generally free from potentially harmful contaminants.” Several submissions in the previous round documented that produced water is not only saline but carries several harmful toxins.

Groundwater and Recharge Zones: On *Page 29, 9.2.9 Recharge Zone*. The claim is made that “project activities pose very little risk to regional-scale groundwater recharge processes.” No evidence is provided to support this claim. In fact earlier submissions once again dispute this claim.

11.1 Offset Land Availability: On *Page 32, 11.1* Santos states the “availability of ‘like for like’ land as being suitable for offset purposes.” The use of offsets has been an ongoing concern with developments of varying kinds and if it were ‘like for like’ then wildlife would already exist there and so would not be available for displaced wildlife as a result of mine activities.

The 2019 Catastrophic Bushfires and Climate Change:

On *Page 40, 14.1 Climate Change and Bushfire Risk*, it is said that “bushfire risks have been addressed based on the extremely conservative weather conditions with the analysis conducted based on a Forest Fire Danger Index (FFDI) rating of 120. This conservative approach is suitable to ensure any increase in bushfire frequency or intensity as a result of climate change is addressed as part of the assessment.” This statement would have to be regarded as outdated and inadequate in view of the totally new reality of the recent 2019 catastrophic bushfires.

The following statement on the same page appears to be very much out of touch with current reality. “The risk of a bushfire being caused by the Project was assessed with consideration of both Project activities and surrounding environmental factors. The assessment found that with the implementation of appropriate mitigation and management measures, the:

- risk of uncontrolled loss of gas leading to a fire or explosion was low to very low;
- the likelihood of bushfire ignition from a Project related activity was remote;
- and
- the overall risk was assessed to be medium given the potential consequences associated with bushfire.”

On the issue of fires again there is a clear indication that Santos is using outdated data and concepts for this important topic. On *page 44, 14.6 Ignition Probability* it is said “Some submitters contended that the 1 in 70 years for fire starts as outlined in the Departments Assessment Report, would be more like 1 in 28 years considering climate change. The 1 in 70 years is the estimated frequency for methane gas ignitions only and is therefore highly conservative and not impacted by climate change. It does not mean that this would lead to a fire related event as it does not consider the probability of these ignitions escalating and leaving the site boundaries and further escalating to cause a bushfire, which is an even more remote risk.”

As a result of the recent catastrophic fires we are now into a totally new fire regime.

The revised Santos proposal fails on many other fronts. Briefly here are a few:

1. It has **no social licence** as has been demonstrated by almost universal opposition by the local and broad community.
2. **Climate**. There is no dispute that this industry has a climate footprint comparable to the coal industry. Its associated toxicity is an added risk.
3. **Water**. Even the slightest risk is too much risk. It is clear that surface and ground water contamination is inevitable in a GAB recharge zone.
4. **Waste**. No *acceptable* solution has been provided regarding produced water and contaminated salt from the coal seam. Santos has not identified a solution to the waste issue, only spurious possibilities. Venting and flaring are significant issues also.
5. **Ecology**. This is a disruptive industry that has a 10 – 30 year lifetime during which the ecological impacts have been well documented. When Santos leaves at the end of the mines short life there is then the legacy of dealing with these impacts for generations to come.

In summary the **Santos** case is made up of generalities, maybes, ambiguities and a general lack of rigour. The revised submission differs from the original in several respects and should be regarded with wariness. The project is **not** subject to the NSW chief scientist's sixteen points for safe gas extraction. They have offered and handed out large financial incentives for support of the project. Marketing has been well resourced. The toxic fallout of the project is **MUCH** larger than the numbers being proposed. This is only for phase one of the project. Subsequent phases will be larger and will be rubber-stamped if phase one is passed. All of North Western NSW will then be subjected to this industry to no beneficial purpose.

Submitted by:

Russell Chiffey, 41 Raleigh St Coffs Harbour NSW 2450
Ph 0409 333 920
Email: russchiffey@gmail.com

I have a background in physics and science and so have a good comprehension of the material presented in the Santos submission.