Director-Energy Assessments Development Assessment Department of Planning and Environment

31 July 2023

Sundown Solar Farm (no. SSD-8911)

Dear Director,

I am writing to OBJECT in the strongest terms to the Sundown Solar Farm (No. SSD-8911).

My childhood was spent growing up in the Swan Vale community. My parents owned two adjoining properties in the area. For 35 years, I worked on the family farm with my parents in their commercial farming operation, growing crops and grazing sheep and cattle. The area's fertile soils and good rainfall enable the agricultural business to flourish.

The future of Lot 42 (listed as R15 in the EIS) to continue to operate as a viable commercial agricultural operation will be enormously impacted should the proposed development of the Sundown Solar farm proceed. My objection to project (SSD-8911) is on the following grounds:

- traffic safety and hazard risk,
- noise,
- dust,
- cumulative impacts of multiple renewable projects in the area.

Traffic safety and hazard risks

The proposed widening of Spring Mountain and Sturmans Road to allow 478 B-Double and construction trucks, shuttle buses and vehicles daily to access the proposed Sundown Solar site using these two public roads has significant safety and financial implications for our farm operation and the wider local community.

No more than approx. sixteen vehicles a day travel along this road network. Both roads are no through roads, 4m wide, unsealed, and used primarily by residents. They have always been very quiet rural roads. Widening to an 8.7 m unsealed road to enable a +960% increase in daily traffic travelling up to 100km/h will significantly increase the risks to human life and the risk to livestock and wildlife along this route — the safety risks to residents, school children and employees of local businesses is very significant.

Sundown Solar considered an 'alternative road' (a private road running direct from Gwydir Highway to the site); however, the EIS cited that it was not 'feasible' because it would be a lower cost to the applicant to upgrade the Gwydir Highway intersection and Spring Mountain/Sturmans Roads than it would be to upgrade the 'alternative road' (private road and connecting Gwydir Highway intersection). The project's capital investment value alone is approximately \$ 689 million, with expected profits

much greater than the initial investment. The costs to Sundown Solar to upgrade the 'alternative road' (intersection of the Gwydir Highway and the private road) are slight compared to the massive financial and social impacts the increased traffic would impose on the multiple commercial farming businesses and residents that reside along Spring Mountain, and Sturmans Roads.

The 'alternative road' is a <u>direct and shorter route</u> to the site. If used, it would mitigate many of the extremely harmful impacts that many of the community would suffer over the lifetime of this project. The public's safety is at greater risk by not making it a condition of consent that the 'alternative road' be used to access the site.

Noise

The noise associated with the construction traffic will impact our family and livestock. Cattle are very sensitive to high-frequency sounds and have a wider range of hearing than humans (a human's auditory range is from 64 to 23 000 Hz, cattle's from 23 to 35 000 Hz). High-pitched noises, such as whistling, are also unpleasant to cows. Intermittent sounds, such as metal clanging, can be particularly stressful, especially if they are sudden and loud. (Moran and Doyle, CSIRO, 2015). Construction noise levels are predicted to exceed the Noise Management Levels, with vibratory rollers operating at 112 dB and water trucks operating at 111 dB.

Noise associated with the 21-month construction and compacting of the 2.4 km section of gravel road that dissects (R15) paddocks will cause immeasurable stress to our animals, affecting fertility, weight, gain and profitability.

We have been investing in our breeding herd for over 30 years through the careful selection of genetics to reduce calf mortality and improve growth rates and the profitability of our business. The ongoing noise associated throughout the life of the 35-year project from its operation, maintenance and daily traffic using the public roads will affect generations of our core breeding stock, leading to adverse outcomes for our farm business and breeding herd.

Dust

Dust from the constant traffic movement will significantly impact our home, drinking water, shearing shed and lifestyle. Our home and vegetable garden is within 5 metres of the road edge. During the construction, the applicant suggested that water tanks could mitigate the worst dust impacts. This is entirely inadequate – water is a scarce resource. The water that Sundown Solar wishes to use to alleviate dust is to be harvested from landholder dams or runoff in tanks or by accessing underground water. Not only does this risk the water security for our livestock, but it also impacts our business financially, limiting the stock levels we can run with the water available.

In addition, the project will only spread water in front of our home, leaving our livestock residing in paddocks with over 2 km of road frontage exposed to significantly higher dust levels from the substantial increase in daily traffic volumes. Dust poses a severe health and welfare issue for livestock, increasing the chance of respiratory diseases such as BVDV and bacterial infections such as pink eye caused by eye irritation from dust.

Cumulative visual amenity impacts and future food production security

The area has seen an avalanche of renewable energy projects underway, in development or proposed. The sun and wind allow Australia to transition to a cleaner feature; however, I do not support the scale and density of the systems being placed on highly productive agricultural land within areas of very secure rainfall.

Large-scale solar farms raise genuine concerns about land degradation and habitat loss. Solar projects have less opportunity to share land with agricultural uses than wind turbines.

With an expected lifespan until 2060, generations of farmers will be unable to utilise highly productive land to meet the future global demands for food security because we have covered the most fertile of our land with solar panels. Australia has limited high-quality agricultural land with secure annual rainfall; it must be preserved.

Yours sincerely,

Swan Vale community member