

Senate Community Affairs Committee Inquiry into the Social and Economic Impacts of Wind Farms

I believe that wind farms sited where there is sufficient wind over an extended period¹ are an important part of the energy mix for Victoria, and for Australia as a whole. We need a range of non-fossil fuel options, to provide ongoing electricity generating capacity, and both wind and solar need to be exploited further. In the interests of efficient use of resources, and because an assured and affordable electricity supply is a public good, we need community and/or government investment in wind and solar power generation, not just leaving it to individual initiative eg installing solar roof panels.

I have read the July 2010 report by the National Health and Medical Research Council (NHMRC) on wind turbines and health (<http://www.nhmrc.gov.au/publications/synopses/new0048.htm>) . The NHMRC undertook an evidence review of the effects of the noise produced by wind turbines, with some lesser investigation of other aspects which have been mentioned, such as electromagnetic interference, shadow flicker and blade glint. It concluded that there 'is currently no published scientific evidence to positively link wind turbines with adverse health effects', despite anecdotal reports of 'effects such as annoyance, anxiety, hearing loss and interference with sleep, speech and learning'.

The noise level associated with a ten turbine wind farm 350 m away has been assessed as no different from everyday situations. It was about the same as in a quiet bedroom, marginally more than the background noise in a rural area at night, and less noisy than a car travelling at 64 km/h 100 m away.

Of course, people show different levels of sensitivity to sound and variable levels of tolerance to different frequencies. Interestingly, studies have shown that perceptions of noise are influenced by the attitudes of the hearer towards the sound source.

Additionally the study found that 'wind turbines of contemporary design, where the rotor blades are in the front of the tower, produce very low levels of infrasound'.²

I have walked in the vicinity of the Toora (Vic) wind turbines and along the walking trail near Albany (WA) which runs close to a number of turbines and I only noticed a gentle swishing sound, far less evident than the noise of the wind blowing in from the sea!

I would like to mention the Hepburn Wind development outside Daylesford (Vic). While there have been some vocal local protesters, the project was approved by council and now appears to have broad community acceptance. It was subject to strict planning conditions through the approvals process and will be closely monitored for compliance with some of the strictest environmental controls in the world. In terms of value the project has already spent more than \$2m in regional Victoria, with more to come. It is expected to generate more electricity each year than is used by the houses in Daylesford and much of the surrounding area, at the equivalent of less than \$6000/house, less than the cost of individual home –owner solar panels.

I believe we need community developments such as this, for the benefits to community in tangible and intangible ways, and for what it is doing in providing renewable energy. Thus I am a shareholder in Hepburn Wind.

Janet Kay

¹ I am informed, for example, that there is insufficient wind to justify wind turbines in and around Melbourne.

² Infrasound is sound that is generally inaudible to the human ear.