

My submission is an urgent request for reassessment of the Renewable Energy Target based on updated and dramatically worse climate science data.

This would include recognition of accelerated melting of arctic and Greenland ice, overshoot of all IPCC worst-case scenarios and the research by Hansen et al showing that when slow climate feedbacks are considered, climate sensitivity for planned global targets is not 3 but 6 degrees (see: <http://arxiv.org/ftp/arxiv/papers/0804/0804.1126.pdf>), all of which implies that current Australian and international government mitigation plans are too weak to avert catastrophic warming, enough to literally wipe out human civilisation, with Australia an early casualty. The Earth's climate history shows that the 6 degree range of warming shifts climatic zones, causes extermination of most species, eradicates glacial and polar ice and elevates sea levels by 75m or more.

The key feature of the approach mandated by consideration of this data is that coal emissions must be phased out globally by the much earlier date of 2030, and in the developed countries, including Australia, by 2020-2025. A submission made by Professor Hansen to Prime Minister Fukuda prior to the current G8 summit, which outlines a credible plan is here: [http://www.columbia.edu/~jeh1/mailings/20080703\\_DearPrimeMinisterFukuda.pdf](http://www.columbia.edu/~jeh1/mailings/20080703_DearPrimeMinisterFukuda.pdf)

Due to the commercialisation time-frame expected for carbon capture and storage (CCS) of coal-fired plant emissions and the above facts, human civilisation cannot gamble on the success of CCS in framing its low emissions energy policy post-2020. Therefore large-scale deployment of currently available emission-free energy sources, like wind and solar thermal, plus intensive energy-efficiency measures, must begin immediately in countries like Australia, to achieve approximately 40-50% reduction in coal plant emissions by around 2018. The other 50-60% would then need to be achieved over the following 2-7 years, by 2020 to 2025, via either CCS if available or more renewable energy, which can be expected to be far cheaper by that time. A high price on carbon and large scale public investment in infrastructure would be key features of such a policy.

The inevitable delays that would be caused by waiting for global agreements means that unilateral leadership in these new targets must be shown by some countries that are willing to take some risks to show the way and give our children and grandchildren some chance of inheriting a liveable planet. Australia, as a wealthy, heavy polluter amongst the most vulnerable of countries, is the logical candidate for showing this leadership.

Thankyou for your consideration.

Dr Martin Williams