

'Anthropogenic Global Warming'

Three letters to the editor in the last edition of *PESA News Resources* (April/May 2011) discussed issues relating to the hypothesis of 'Anthropogenic Global Warming' (AGW), making reference to my views published in a letter to the editor in the previous issue (February/March 2011). The main purpose of that letter had been to challenge claims made previously by Gareth Cooper on past climate change and Cedric Griffiths on the role of geologists in relation to the AGW hypothesis.

Two of the letters in the latest issue of *PESA News Resources*, by Graham Bradley and John Geary, agreed with views expressed in my previous letter. The other, by Andrew Nelson, stridently disagreed with the part of my letter relating to the reliability of the UK Met Office's prediction of warm temperatures in the UK during the winter of 2010-2011.

The Met Office prediction was made in October 2010, and was based on computer modelling using its supercomputer. It predicted a 60% to more than 80% chance of warmer-than-average temperatures in the UK during the winter of 2010-2011. In point of fact, frigid conditions prevailed during that period throughout most of Europe, including the UK. Andrew Nelson pointed out that some other parts of the world did experience warm temperatures during that period, but of course such opposite extremes are common with global weather. For example, Australia as a whole had much higher-than-average rainfall during the past summer, but the southwestern part of the continent had severe drought. No forward predictions on weather and climate can ever be 100% reliable, but a

60% to 80% prediction would suggest a high level of probability. The fact is that the UK Met Office's prediction proved to be very wide of the mark.

This example of the limits of computer modelling needs to be acknowledged, because of the dire predictions that have been made regarding climate change, supposedly due to AGW and based on computer modelling. That modelling has hitherto proved to be unreliable, having failed to show that since the very hot year of 1998 overall global temperatures have been significantly cooler than predicted.

Many geologists in Australia, and no doubt around the world, are sceptical about AGW. They know from the geological record that the world's climate is always changing in response to purely natural causes. For example, during the last interglacial period, some 120-130 thousand years ago, temperatures reached significantly higher levels than now, and global sea levels were much above present levels. No one can deny that this resulted from purely natural causes – there could be no human-induced CO₂ at that time. Sea level is now rising around the world at an average rate of only about 2 mm per year, much below levels predicted by doom-sayers.

Nevertheless, the executive of the Geological Society of Australia released a position statement on global warming in 2009 that supported the 'politically correct' view that recent warming has resulted from anthropogenic CO₂ emissions. That statement caused widespread concern among members of the Society and led to a number of

resignations. An independent poll was then conducted by two Society members. A questionnaire was sent to 2384 members, asking two questions:

1) Do you agree with the Geological Society of Australia Position Statement on anthropogenic global warming; and

2) Were you approached to contribute to designing the Position Statement?

Of the 626 members who responded to question 1), 332 (53%) answered No and 294 (47%) answered Yes.

Of the 632 members who responded to question 2), 624 (98%) answered No, and 8 answered Yes.

The response came from about one quarter of the Society's membership, and it confirms that many Australian geologists are sceptical about AGW. It led to the executive withdrawing its position statement from the web, pending further consultation with members.

It also needs to be acknowledged that some scientists have suggested that the world may soon be faced with a return to the frigid conditions of a 'Little Ice Age' or even a full-scale ice age. That prediction may or may not prove to be correct, but it needs to be understood that warming climates are generally favourable to humans, whereas a return to another ice age would be disastrous.

Phil Playford ■