

## WHEN DOES GLOBAL WARMING START?

From an academic perspective, global warming occurs when global temperatures move from a lower to a higher temperature. For instance; from minus 20 degrees to minus 15 degrees. However, because we have been conditioned to believe that global warming is 'nasty', we are not interested in this academic perspective. The question should be rephrased "When does 'nasty' global warming start?" The answer to this question is subjective, but one that is important to answer.

Unless we want to live in the coldest temperature that occurred in the last ice age, we should not believe nasty global warming starts on the first day after the coldest day in the last ice age. Also, we probably should not choose the day that someone subjectively declares the ice age finished, as such declarations are generally based on how far ice sheets have retreated, rather than at a particular global temperature. We might want the temperature to be higher than the temperature on that day, and generally would want, and expect, temperatures to rise as we come out of an ice age.

Since we consider global warming to be nasty warming, we might not want to declare that global warming has started at temperatures that Man has happily been through before and has adapted with few, if any, negative impacts. If you accept the foregoing, then the subjective decision to start calling normal warming 'nasty warming' must occur sometime after this historical high temperature is exceeded.

We are presently coming out of the Little Ice Age that many believe ended in 1850 (others believe 1825, or as late as 1900). The global temperature rise from 1850 to 2008 has been approximately 0.5<sup>0</sup>C. I do not believe such a small temperature rise over a 158-year period, after coming out of an ice age, can be considered nasty global warming. The IPCC believes there may be a rise of 2.6<sup>0</sup>C (the mid range temperature estimate) by 2100 – a temperature cooler than Man experienced in the Medieval Warming Period. Once again, this might not be considered "nasty" global warming whereas say, exceeding a 4<sup>0</sup>C rise might be considered the start of the "nasty" global warming.

The point I am making is that nasty global warming has not started yet, and may not be seen for a hundred years, yet we have large sections of our community already imagining nasty global warming events occurring right now, even though they are observing normal temperatures with both normal cooling and warming movements. Unless we answer this question sensibly, in the next one hundred years we will have far too many people jumping at shadows that are, in reality, normal events. Such a response is not helpful if we seriously wish to respond to nasty global warming events if they occur in the future.