The Kyoto Protocol

Is it Sound Science?
Is it Good Economics?
Is it Prudent Policy?

Should Australia Ratify?

• The Lavoisier Group Inc •
**What it means to ratify.** If the Kyoto Protocol is ratified by sufficient countries to give it international legal status, and if Australia decides to ratify the Protocol and thus voluntarily agrees to accept the obligations and commitments set down in the Protocol, the following consequences will take place:

- **Requirements.** Australia will be required to restrict its emissions of carbon dioxide and other greenhouse gases (prescribed in the Protocol) to 108 per cent of its 1990 emissions by 2010. There has been much debate about what this means in terms of millions of tonnes of carbon dioxide Australia will be allowed to emit without incurring penalties imposed by the Compliance Committee of the Kyoto Secretariat. An estimate based on Australian Greenhouse Office projections in April 2001 predicts that we will have to reduce our emissions of carbon dioxide from a projected 567 million tonnes (of which over half comes from power stations) to 416 million tonnes.

- **Consequences.** Because Australia today produces 86.5 per cent of its electricity from coal-fired power stations, the only way Australia can meet this Kyoto commitment (apart from rationing) is to impose large taxes on coal, which will in turn be passed on to electricity consumers. The brown-coal power stations of the Latrobe Valley in Victoria, the largest emitters of carbon dioxide per unit of output in Australia, will either have to convert to natural gas or shut down. Large increases (typically 50 per cent) in the price of electricity will suppress domestic demand. Those industries such as aluminium smelters, which rely on low-cost electricity to remain internationally competitive, will be forced to relocate to countries such as India and China which, although signatories to the Kyoto Protocol, are under no obligation to reduce their emissions of carbon dioxide or other greenhouse gases.

- **Alternatives.** Those who support the Kyoto Protocol, and urge Australia to accept the Kyoto commitments, claim that other methods of producing electricity can replace coal-fired power stations without detriment to the Australian economy and to employment opportunities. The technologies they propose are windmills, wave power or tidal power systems, solar power, and woodchip-fired power stations. The problem with these alternative power sources is that they are at least three times as expensive as coal-based electricity. The only power source which is remotely competitive with coal-based power and which does not produce carbon dioxide is nuclear power. And that is an option which is specifically proscribed.

- **Why do it?** Australia is being urged to commit to an economically damaging policy because it is alleged that man’s use of fossil fuels is increasing concentrations of carbon dioxide in the atmosphere; that global temperatures are increasing as a consequence; and that increasing temperatures will cause sea levels to rise, increased cyclonic activity, and the spread of tropical diseases such as malaria.

- **Misconceptions.** There are two problems with this argument. The first is that 22 years of satellite measurements of atmospheric temperatures show virtually no temperature increases in the atmosphere, precisely where the greenhouse theory requires them to be manifest. The second is that not only would a reduction by Australia of carbon dioxide emissions from 567 to 416 million tonnes have no discernible impact on atmospheric carbon dioxide concentrations; the world-wide reduction mandated under the Kyoto Protocol would, likewise, have no discernible impact on these concentrations.

- **Having our own policy.** Regardless of what other countries do, Australia does not have to ratify the Kyoto Protocol. The US has rejected it. Why should Australia export jobs and investments to other countries, and accept a much lower standard of living, merely because the European Union (the champion of the Kyoto Protocol), on the basis of an unproven theory, demands that we should?
Kyoto and Global Governance

If the Kyoto Protocol is based on such weak scientific foundations, why have so many governments put their prestige and authority on the line in order to bring it into effect?

The prime mover behind Kyoto is the European Union. There has been a great deal of speculation and comment as to why the EU should be so energetic and ambitious as the champion of Kyoto.

• If the Kyoto Protocol comes into effect, there will be the transfer of administrative and political authority, from the EU member states, to the European Commission in Brussels, in the energy, transport and forestry portfolios. This will be a massive power shift.
• An international decarbonisation treaty would enable Germany to close most of its heavily subsidised coal-mining industry, and switch to natural gas imported from Russia. This would yield annual savings of nearly US$100 billion.
• The choice of 1990 as the base year for calculation purposes allows the EU to meet the Kyoto targets at very little or even zero cost, particularly if the German coal industry is shut down.

President Jacques Chirac of France described the Kyoto Protocol on November 20, 2000, as ‘an unprecedented instrument, the first component of an authentic global governance . . .’

The Secretariat of the Kyoto Protocol will be based in Bonn, the former capital of West Germany. It will be responsible for measuring carbon dioxide and other greenhouse gas emissions around the world, and for providing enforcement and compliance machinery to ensure that those parties to the Kyoto Protocol which have accepted commitments to reduce their greenhouse gas emissions are, in fact, meeting their commitments. This is a major bureaucratic task and will require many thousands of people, who will have to travel all over the world, to carry it out.

If the Kyoto Protocol comes into effect, all decisions affecting carbon dioxide-emitting plants such as power stations, smelters and energy-intensive plants and factories (but only in those countries which have agreed to accept commitments to reduce emissions of greenhouse gases), will ultimately have to be cleared in Bonn. For the Europeans in general, and the Germans in particular, this is an exciting prospect.

But why should developing countries such as India and China see any advantage in the creation of a Protocol which, even though it imposes no obligations on them to reduce their consumption of fossil fuel, will establish supra-national institutions which could one day impinge on their sovereignty?

India, China, and other developing countries believe that as a consequence of Kyoto, energy-intensive industries will relocate from countries such as Australia, to them, and so they will benefit from major new investments which otherwise they might not have been able to attract.

In addition, the Kyoto Protocol promises lots of aid money for ‘joint implementation’ projects, technology transfer, and other financial assistance packages. It is very difficult for developing countries to resist such promises.

The Europeans and the developing countries have come together in an alliance which combines Europe’s hope of playing an imperial role as the driving force in an international treaty which is unprecedented in its intrusiveness into the domestic affairs of the parties to the Protocol; with the developing countries’ anticipation of rapid investment in energy-intensive industries, combined with greatly increased aid packages from the developed world.

Australians who value their sovereignty and traditions of self-government will have no part in such a deal.
The climatic history of the earth has been a history of great contrasts. Fifty million years ago, the world was warm and wet, with atmospheric concentrations of carbon dioxide about 10 times what they are today. Trees and other vegetation were abundant, and crocodiles dwelt in the Arctic. Some of the vegetation which was then so prolific in this carbon-enriched world eventually became the remarkable brown coal deposits of Gippsland and other parts of Victoria.

Carbon dioxide was the great plant nutrient of the time (and is to this day). But in more recent times, much of the Northern Hemisphere has been covered in ice. A mere 20,000 years ago, ice sheets covered northern Europe and North America. Australia was cold and very dry, and sea levels were 130 metres lower than today. Ice ages have been the exception in our climatic history; but at this time we are living near the end of an interglacial period, and a concern for our climatic future that was based on historical evidence would be a concern about a sudden return of Ice Age conditions; not about global warming based on a theory which has so far failed to meet the test of empirical evidence.

The greenhouse theory tells us that greenhouse gases (of which water vapour comprises at least 95 per cent of the total) act as a kind of blanket, and trap outgoing radiation from the earth within the earth’s lower atmosphere. It is then argued that increasing concentrations of greenhouse gases, particularly carbon dioxide, will cause increasing global surface temperatures. On the assumption that atmospheric concentrations of carbon dioxide will reach 250 per cent of what they are today, computer models of the earth’s atmosphere have predicted temperature increases of up to 5.8 degrees Celsius.

Greenhouse gas concentrations have been rising, particularly in the last 50 years, and it is usually said that the increase since 1950 is of the order of 50 per cent. (This is very small compared with the concentrations of the Eocene era of 50 million years ago.) But it is impossible to avoid the conclusion that, if the greenhouse theory is valid, we should now be able to observe atmospheric temperature increases that correlate with increases in greenhouse gas concentrations.

Since 1979, satellites have been taking temperature measurements at three different levels in the atmosphere, covering the entire globe. The satellites make no distinction between land or ocean, city or country, day or night. The results of this huge temperature data set are shown in the diagram. The net change over 22 years is 0.06 degrees Celsius—a barely perceptible increase of 0.003 degrees Celsius per annum.

There is an ongoing and vigorous debate about global surface temperatures over the last century, and the majority view is that there has been some surface warming in this period. But the satellite data is unambiguous. If greenhouse is in fact a warming mechanism, the atmosphere has to warm before the surface warms. The atmosphere, however, has not warmed in the last 22 years. Whatever surface warming that has occurred during the last century cannot, therefore, be attributed to the greenhouse effect.

This simple scientific fact, then, is the lion in the path of the Kyoto Protocol. Without real and verified atmospheric warming, the greenhouse theory is just a theory. For Australia to ratify the Kyoto Protocol is to commit to a policy of decarbonisation of our industrial and export base. It is to inflict upon its people unemployment, profound economic dislocation and decline; and it is to do so entirely on the basis of an unproven and strenuously contested theory. For a nation to inflict upon itself such economic and political damage is almost unprecedented.
The Lavoisier Group is named after the founder of modern chemistry, Antoine-Laurent Lavoisier, who discovered oxygen, identified carbon dioxide as the product of combustion of carbon in air, and who laid down the theoretical basis of modern chemistry. He was also an ingenious experimenter and instrument-maker who insisted on the highest possible accuracy when taking measurements. He was executed by the French Revolutionary Government in 1794.

The Lavoisier Group was incorporated in April 2000. The founders were concerned that Australia might ratify the Kyoto Protocol without properly understanding either the scientific claims on which it is based, or the economic implications which would follow from the regime of decarbonisation which the Kyoto Protocol requires. The Group seeks to stimulate debate and discussion about the science, the politics and the economics of the Kyoto Protocol, so that even if many other countries ratify it, Australia will make a decision based wholly on our national interest.

The Lavoisier Group holds conferences and publishes papers on its Website: www.lavoisier.com.au People who sympathise with the aims of the Lavoisier Group and wish to join, can apply for membership through the Website.

The Lavoisier Group’s Board comprises Peter Walsh AO, President; Ian Webber AO, Vice President; Harold Clough AO, Treasurer; Peter Murray AOM; Bruce Kean AM; Bob Foster; Ray Evans, Secretary.