



China's Route to a Green and Prosperous Future

By Roger Bate

By opening its economy to greater domestic and foreign investment in the technologies needed to reduce greenhouse gas emissions, China can dramatically improve its environmental record while becoming richer. The same promise holds for other developing countries as well.

Freeing the Chinese economy will hasten development and lower emissions of greenhouse gases per unit of growth produced. Policies that freed the economy would have a greater impact on greenhouse emissions than the entire Kyoto Protocol, and it would not take one hundred years, but eight years, to have that effect.

China is a relatively unfree country by most measurements, including those in the *Index of Economic Freedom* produced by the Heritage Foundation and the *Wall Street Journal*. But China is economically open compared with the entire African continent and many other developing countries. The correlations, which universally demonstrate that less free countries are poorer, are backed up by causal relationships based on lack of respect for the rule of law, property rights, and the other institutions of free societies, which are so important to development. As a result of their lack of freedom, repressed economies, including Sudan, North Korea, and Iran, also have worse health, as measured by life expectancy and child mortality, and have dirtier environments, as measured by urban air pollution and water quality measurements. With a few exceptions, such as excessive use of water, China's performance is strides ahead of these repressive nations and is improving

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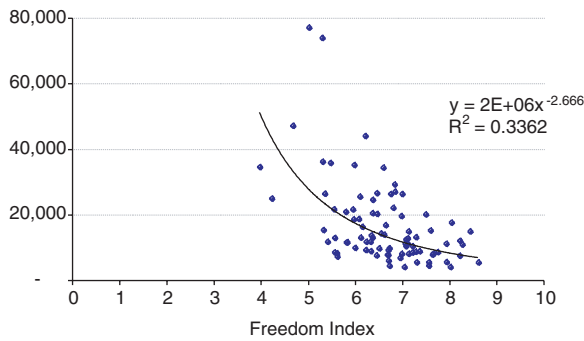
dramatically as its opens its economy. China has a long way to go to approach western openness, but the future looks good.

Economics and the Environment

In the July–August 2004 issue of AEI's *Environmental Policy Outlook*, David Montgomery and I analyzed the association between freer countries and their emissions of the greenhouse gas carbon dioxide. It is often said that rich countries produce most of the greenhouse gases around the world; historically this was the case. But as developing countries have grown, their emissions have now overtaken those of the established countries in the Organization for Economic Cooperation and Development. And since emissions in developing countries are set to increase far faster in the future, any realistic international policy has to include them; the most widely discussed current policy, the Kyoto Protocol, does not.

A strongly statistically significant result was obtained from our analysis showing that freer economies use energy more economically (see figure on following page) and produce less carbon dioxide for each unit of growth produced than do repressed countries. The undeniable conclusion of this analysis is that increasing freedom leads not only to faster growth, but also lower relative emissions of a potentially dangerous greenhouse gas.

Figure 1: Economic Freedom Compared to Energy per Dollar (Btu per 1995 \$) of GDP (2001)



In our *Outlook* study, Montgomery and I analyze five developing and transition economies to see how they compare in terms of freedom and emissions profiles. (See table.) All the countries—China, India, Indonesia, Russia, and South Africa—have freedom indices at the low to mid-range of economic freedom, with Russia rated the least free and South Africa the most free. China’s low score on economic freedom indicates pervasive market distortions based around its large state sector, which is impervious to market pressures and which notably does not encourage energy efficiency improvements. Furthermore, China’s successful enterprise zones do not encourage the diffusion of their newer technologies into the rest of the economy. India and Indonesia have price regulations and domestic industry protection that mirrors China’s problem; in addition, Indonesia and Russia have political instability (at least in the energy sector), which puts all investments and new technologies at risk. Russia’s corruption and regulatory inconsistencies make it the least free and most energy inefficient. Given its deposits of dirty coal, South Africa performs relatively well on carbon dioxide emissions; however, some political instability and government control of pricing means its technology adoption from overseas is not what it could be.

The implications from the analysis are significant. If China were to adopt U.S. standard technologies in the

Table 1: Energy and Carbon per GDP for Five Countries (2001)

Country	Energy per GDP (Btu per 1995 \$)	Carbon per GDP (MMTC per 1995 \$b)	GDP per capita (Thousands of 1995 \$)	Freedom Index
China	36,578	0.77	0.9	5.49
India	27,053	0.54	0.5	6.12
Indonesia	20,376	0.37	1.0	5.57
Russia	75,546	1.15	2.5	5.04
South Africa	25,568	0.58	4.0	6.77

SOURCE: Energy Information Administration, International Energy Annual, 2002.

plant it is building today, by 2012 a greater reduction in greenhouse gases would be achieved by China alone than by all action by all nations who signed up for the Kyoto Protocol (and compliance toward this target is uneven at best). But to do so, foreign and domestic investment in new technology must increase, and for this to occur these economies must become freer, because only in that case will the best technologies be adopted. China for one looks as though it may move in this direction.

Of course free nations produce more of everything consumers want, and total emissions may rise if repressed countries became free (a lot depends on population changes too), but there is no doubt that the world will be richer and more able to adapt to any dangers from the climate if economic freedom spreads. After all, the hurricanes that damaged Florida this fall killed more people in desperately poor, backward, and unfree Haiti than in the rest of the Caribbean put together. So even if climate change leads to more extreme weather events (as is predicted by some scientists), the harms from such events will be far smaller in the future if repressed nations such as Haiti become freer and more prosperous.

Also, people in such nations deserve the chance to become wealthy and develop as we in the West have. If the impetus for change toward freedom is combatting climate change, then so be it.