

Population growth, rapid industrialization, urbanization and higher per capita incomes will ensure domestic energy demand will grow. The composition of China's existing and expected supply of energy have significant implications for the environment. Coal accounts for roughly three-quarters of China's total energy consumption and production. With enormous recoverable and estimated coal reserves, and limited oil and gas reserves, it is unlikely this percentage will significantly change in the near future.<sup>57</sup> In the case of China, economic growth means the continued burning of large, and cheap, quantities of coal. Moreover, in comparison with the West, the per unit burning of coal in China is more environmentally stressful. Most coal in China, perhaps up to 80 percent, is not cleaned before combustion and consequently has higher emission levels.

The environmental impact of burning coal, that is particle and carbon dioxide emissions, and acid deposition, have local, regional and global effects. In the long run, such effects have the potential to contribute to heightened international tensions. Locally, particle emissions contribute to respiratory health problems. The effects of acid rain, due to sulfur dioxide and nitrogen oxide emissions from coal, are both local and regional in scope. According to an analysis of rainwater in 23 provinces, regions, and municipalities, 44.5 per cent of the samples detected acid rain.<sup>58</sup> To some extent, acid precipitation in northern China due to the sulfate concentration of rainwater is tempered by alkaline and saline dust from the central Asian desert. However, in areas south of the Yangtze river, very acidic rain-falls have been recorded.

China is a party to the Framework Convention on Climate Change (FCCC). The objective of the FCCC is the "stabilization of greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system."<sup>59</sup> The Climate Convention calls for the developed countries to reduce their greenhouse gas emissions to 1990 levels by the turn of the century. The first Conference of the Parties to the FCCC, held in Berlin in April 1995, did not result in any new targets for the reduction in greenhouse gas emissions. Nor did the conference extend targets to the developing countries. The developing countries flatly reject the extension of emission targets and timetables to themselves. This two-track approach could fuel international tension, since China's coal-based energy

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<sup>57</sup>Robert Livernash, "China and India Shape Their Destinies," Environment, July/August 1995, p.27.

<sup>58</sup>Qu Geping and Li Jinchang, translated by Jiang Baozhong and Gu Ran, Population and the Environment in China, 1994, p.35.

<sup>59</sup>United Nations, Framework Convention on Climate Change, Article 2.