

Home> NewsPeopleObituaries

## Bert Bolin: Meteorologist and first chair of the IPCC who cajoled the world into action on climate change

Published: 05 January 2008

Bert Richard Johannes Bolin, meteorologist: born Nykoping, Sweden 15 May 1925; Professor of Meteorology, Stockholm University 1961-90; Chair, Intergovernmental Panel on Climate Change 1988-97; married Ulla Frykstrand (two sons, one daughter; marriage dissolved 1979); died Stockholm 30 December 2007.

The Swedish meteorologist Bert Bolin was one of the giants of the climate-change debate. For 30 years he, more than any other individual, made sense of the rising tide of research emerging from weather observations and computer models, and cajoled a reluctant world into recognising the urgency of the issue.

Between 1988 and 1997, Bolin chaired the Intergovernmental Panel on Climate Change. These were the years of the IPCC's most crucial work, establishing a broad scientific consensus for political action, and many believe Bolin, more than the panel's current leading lights, deserved the Nobel prize that it won last month.

Bert Bolin was born in Nykoping, Sweden, in 1925. An early academic high-flier, he swiftly joined a long tradition of world-renowned Swedish meteorologists. In the 1950s, he had already earned a reputation as a pioneer in using computers to predict the weather. But by the end of the decade he had found his true role by being one of the first scientists to recognise the importance to future climate of new findings about rising concentrations of carbon dioxide in the atmosphere.

Bolin turned himself into an expert on the carbon cycle and the influence of industrial emissions of carbon dioxide on climate. From 1961, when he became Professor of Meteorology at Stockholm University, his influence grew.

The historian of global warming Spencer Weart says Bolin uniquely combined "scientific savvy with an unusual ability to communicate and inspire people, developing outstanding diplomatic skills" that came to the fore at the IPCC. Michael Oppenheimer, Professor of Geosciences at Princeton University, this week called him a "scientific statesman".

Bolin was a leading figure at the now-legendary meeting of scientists who discussed the future threat from climate change, held at Villach in Austria in 1985. More than any other participant, it was he who had responsibility for turning the conference's findings – which went unreported in the press at the time – into a manifesto for global action. He wrote the 500-page report, which warned that "in the first half of the next century, a rise in global mean temperatures could occur which is greater than any in man's history", and called for a "global convention" to prevent it. And he persuaded the UN Environment Programme's then director Mostafa Tolba to adopt its conclusions.

The meeting proved a catalyst, resulting in the formation by the UN in 1988 of the IPCC. It was charged with advising the world on the science of climate change, and Bolin became its first chairman. The IPCC's first report, published in 1990, resulted in an agreement two years later at the Earth Summit in Rio, of a UN Climate Change Convention, out of which the Kyoto Protocol emerged.

The 1992 Climate Change Convention pledged countries to prevent "dangerous" climate change. Under Bolin, the IPCC was often criticised for refusing to define what dangerous might be. Bolin insisted that was a political rather than a scientific judgement. "It is a danger every time the IPCC meets that the politics will dominate," he once said.

But he had his own views. In 1997 he was one of the first climate scientists to suggest that a maximum carbon dioxide concentration in the air of 450 parts per million might be a safe limit. In saying that, he undermined a consensus at the time that 550 ppm (twice pre-industrial levels) would be good enough. He has been proved right. At the Bali climate conference last month, where governments began talks on a successor to the Kyoto Protocol, there was near-universal consensus that it would be dangerous to go beyond Bolin's 450 ppm target.

Bolin always worked hard at the IPCC to establish a broad scientific consensus by bringing in researchers with divergent views, even outright climate sceptics. But that was never an excuse for sitting on the fence. As early as 1991, he was chastising politicians for refusing to face up to the science, and

## Bert Bolin: Meteorologist and first chair of the IPCC who cajoled the world into actio... Page 2 of 2

accusing them of exploiting difference on detail within the scientific community to excuse inaction.

"What we know now is sufficient for action now," he said that year. "There is no excuse for politicians if they wait until all the scientific debate is over before acting. It is better to be roughly right now, rather than precisely right later."

Always modest and quietly spoken, Bolin was at his best as an interpreter of the significance of new science. He was among the first climate scientists to realise, back in the 1970s, that smogs and sulphate pollution from acid rain could be masking the impact of global warming by cooling parts of the planet. And as editor of the small scientific journal Tellus, he was, in 1974, the first academic to publish James Lovelock's then heretical views on Gaia – the notion of life on Earth regulating the environment to its own advantage.

Bolin, who continued to live in Sweden, accumulated numerous awards and held a range of other posts, including scientific director of the European Space Agency. His last project was to complete a book, A History of the Science and Politics of Climate Change. Published in November 2007, it is a narrative that in part amounts almost to autobiography – such was Bolin's influence on the subject.

Fred Pearce

© 2008 Independent News and Media Limited