Workshop

Postnormal Science: The Case of Climate Science

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Climate science plays a pivotal role in the debate about anthropogenic climate change. Recent discussions and scandals surrounding scientific conduct or hybrid institutions such as the IPCC suggest that climate science is still an exemplary case for 'postnormal science' as defined by Ravetz and Funtowizc (1991): facts are uncertain, values are in dispute, stakes are high and decisions are urgent. On the occasion of Jerry Ravetz' visit to Hamburg in May 2011, we organize this workshop in order to discuss the current state of climate science. Does the concept of postnormal science indeed still apply to climate science, and if so, what are its implications? How to deal with the challenges from society and politics in an appropriate way without losing scientific credibility? How to define and to locate climate science in the field between humanities and natural sciences? The overall goal of this workshop is to enhance the understanding of the current role of climate science in the public debate about global warming.

We will begin with a review of the concept of postnormal science, which since its introduction has undergone a number of revisions and criticism. Does it indeed help to bring forth a new understanding of climate science, or does it instead pave the road to junk science? We also want to learn about other concepts, which share the basic premises, but come to different conclusions. The presence of Jerry Ravetz will be a great opportunity to reflect on the history of postnormal science and related approaches.

In a second phase, the workshop seeks to put the discussion on a solid empirical foundation. We will invite participants to present own experiences, which qualify climate science as postnormal science. We seek contributions that highlight individual encounters with politics, the media or the public, with vested interests or even with ideological 'gatekeeping' etc. In our opinion, the focus on detailed ethnographic accounts will mark the difference to a normal understanding of science and help to clarify what 'postnormal' exactly means.

Following from this, we will discuss new developments in the practice of science. One example of such developments is the emergence of the blogosphere, which obviously has changed communication between science and the public; it might, as some suggest, also transform the practice of scientific publication and peer review. Another development to be discussed is geo-engineering as an already established branch of climate science. Finally, there is active policy intervention via open letters, public papers or manifestos by scientists and think tanks in order to influence and shape the public debate. These activities raise additional questions: when does a scientist become an advocate, where are the limits of public intervention, and what is proper scientific conduct?

Finally, we will have a concluding discussion on the current state of climate science, from which a joint conclusion might develop. With contributions from both the humanities and natural sciences, this workshop invites to overcome traditional understandings of the role of science and to discuss new ways in order to meet the challenges of both a changing society and a changing climate.