

GERMANY

Highlight of developments since the 2nd meeting of the WPMN

The NanoCommission (NanoDialog) continues its work with the help of three working groups:

1. The first Working Group "Opportunities for Health and Environment " concentrates on the question: How can the use nanomaterials contribute to sustainable economic and social development in Germany, in particular to environmental/health and consumer protection? The Working Group wants to identify and describe selected nanoproducts or applications which deliver a special benefit for the environment or for consumers. These opportunities will be checked concerning their sustainability throughout their life cycle, at least qualitatively.

2. A second Working Group is called "Risks and Safety Research" and consequently deals with the possible risks posed by nanomaterials, especially the gaps in our knowledge, which we need to fill as soon as possible. The aim is to develop a programme for future safety research plus suggestions for concrete projects. Since many products containing nanomaterials are already on the market and we expect a further increase in the future, this working group will assess the risks for some selected nanomaterials based on present knowledge.

3. In order to provide preventive protection to employees, consumers and the environment, a third Working Group develops "Guidelines on the Responsible Use of Nanomaterials". The group started the work on a Guideline for worker protection and is now working on basic principles on which all Guidelines should be based and on indicators to monitor their implementation. The aim of Working Group 3 is, that industry and user companies adopt these Guidelines as a "Code of Good Practice".

Since 2007, the "Nano Initiative - Action Plan 2010" gives a framework across all government departments. The leading Ministry "Education and Research" (BMBF) has started this initiative, together with six others (Environment (BMU), Labour and Social Affairs (BMAS), Food, Agriculture and Consumer Protection (BMELV), Defense (BMVg), Health (BMG) and Commerce and Technology (BMW)). The NanoDialog Project is part of this action plan.

Work completed, underway or planned

1. Any national regulatory developments on human health and environmental safety including recommendations or discussions related to adapting existing regulatory systems or the drafting of laws/ regulations/ guidance materials

The Federal Government identified, that - for the moment and based on the current state of knowledge - our legislation can principally protect humans and the environment concerning applications with nanomaterials and that it covers many flexible instruments for this task. At the same time the required tools for example for risk assessment need to be further developed. As nanotechnology will be more and more used in many applications legislation and regulation need to be checked again in the future, whether they are sufficient to protect man and environment.

2. Developments related to voluntary or stewardship schemes

The Federal Institute for Occupational Safety and Health (BAuA) developed in collaboration with the Chemical Industry Association (VCI) a questionnaire to collect information on exposure of nanomaterials and risk management at workplaces of the chemical industry and research institutions. The feedback from industrial and research companies was evaluated, summarized and published as a report in German in the magazine "Gefahrstoffe-Reinhaltung der Luft" 10/2007, pp. 419-424:

[www.technikwissen.de/gest/currentarticle.php?data\[article_id\]=38107&PHPSESSID=45f53091cdd716651169e251e2462e73](http://www.technikwissen.de/gest/currentarticle.php?data[article_id]=38107&PHPSESSID=45f53091cdd716651169e251e2462e73). An English translation will be available soon.

3. Information on any risk assessment decisions

Not applicable due to lack of information

4. Information on any developments related to good practice documents

The Chemical Industry Association (VCI) has developed in collaboration with the Federal Institute for Occupational Safety and Health (BAuA) a handling guideline for the responsible handling of nanomaterials during production and use. The draft was discussed at a work shop to consider further input from a variety of stakeholders. A finalized version is available under:

www.baua.de/en/Topics-from-A-to-Z/Hazardous-Substances/Nanotechnology/Nanotechnology.html

5. Research programmes or strategies designed to address human health and/ or environmental safety aspects of nanomaterials

The joint German research strategy, developed by the BAuA (Federal Institute of Occupational Safety and Health) together with BfR (Federal Institute for Risk Assessment) and UBA (Federal Environment Agency) considering health issues of workers and consumers and the environment issues had been discussed with stakeholders from industry, science, policy, and NGOs. At present it is under revision.

6. Information on any public/ stakeholder consultation

In 2007, the Federal Institute for Risk Assessment (BfR) issued two projects on public perception of nanotechnology. The first project is a fundamental psychological study linked with an opinion poll in the German public. The project aims to analyse appraisal, standard of knowledge and expectations of consumers, to identify psychological factors of perception of nanotechnology and to compile an image of nanotechnology. The BfR conducts this project together with Vierboom & Härten, Business Psychologists and the University of Bonn. First results are expected for December 2007.

In the second project the BfR is currently conducting a study on a media analysis of articles on nanotechnology published in German daily newspapers and popular magazines. The project is intended to investigate how nanotechnology is framed in mass media debate, who is taking part in the debate, which arguments dominate and which metaphors illustrate the debate. The project is staged jointly with the University of Muenster and will be finished in June 2008.