

UNECE CONVENTION ON THE TRANSBOUNDARY EFFECTS OF INDUSTRIAL ACCIDENTS

UNECE COMMITTEE ON HOUSING AND LAND MANAGEMENT

REPORT

JOINT SEMINAR ON LAND USE PLANNING AROUND HAZARDOUS INDUSTRIAL SITES

Introduction

The joint seminar on land use planning around hazardous industrial sites was held in The Hague, the Netherlands on 11-12 November 2010. It was organized in the framework of the Convention on the Transboundary Effects of Industrial Accidents and the Committee on Housing and Land Management. It offered a unique platform for exchange of views and experience between authorities and the private sector on issues surrounding land use planning and industrial safety.

The Ministry of Infrastructure and the Environment of the Netherlands (IenM) hosted the joint seminar.

Objectives

The purpose of the seminar was to facilitate a dialogue at international level aimed at building better understanding between stakeholders working on industrial safety and land use planning for ensuring safe neighbourhoods around major hazardous industrial facilities.

More specific objectives were as follows:

- (a) To signal safety concerns regarding new developments around major hazardous industrial facilities and to discuss the role of land use planning in hazard prevention;
- (b) To identify the priorities and interests for safety authorities, land-use planners, operators of major hazardous industrial facilities and real estate developers in their work and how this relates to hazard prevention;
- (c) To share experience, good practices and challenges on cooperation between different stakeholder groups from UNECE countries and to discuss the availability of different instruments and policies;
- (d) To identify possibilities and recommendations on how best to improve cooperation.

Participation

The joint seminar was attended by experts representing land use and/or safety authorities from the following countries: Albania, Austria, Azerbaijan, Belarus, Belgium, Bosnia and Herzegovina, Cyprus, Denmark, Estonia, Finland, Georgia, Germany, Greece, Italy, Kyrgyzstan, Malta, Netherlands, Norway, Poland, Portugal, Republic of Moldova, Russian Federation, Serbia, Slovenia, Switzerland, Tajikistan, The former Yugoslav Republic of Macedonia, Turkey, Ukraine, United Kingdom of Great Britain and North Ireland and Uzbekistan.

Representatives of the Joint Research Centre of the European Union, Shell Netherlands B.V., Polski Koncern Naftowy Orlen S.A., GCE Group, ICARO, Zoi Environment Network, and the European Environmental Bureau also attended the seminar.

Seminar's highlights

The seminar heard opening addresses by Mr. Hary Paul, Inspector General, IenM and by Mr. Sergiusz Ludwiczak, UNECE secretariat. Mr. Hans ten Velden, Deputy Director of the IenM's National Spatial Planning Directorate, chaired it.

The scene for the seminar was set by Mr. Bernard Gay (Switzerland) and Mr. Frans Timmerman (Netherlands) who presented basic principles respectively for industrial safety and land use planning. It was followed by the **Session I** which aimed at building understanding on the priorities and interests the different stakeholders may have in the area of safety and land use planning. The presentations concluded following priorities and interests for the different stakeholders groups:

- (a) Safety authorities aim with their work at ensuring safe operation of industrial hazardous sites through enforcement of relevant major accident prevention policies. They seek to establish good level of cooperation with the operators of industrial sites, as well as to build safety culture;
- (b) Land use planning authorities work towards ensuring effective use of land through guiding new developments including buildings of different functions and infrastructure. They aim at establishing good quality of living as well as good capacity for economic performance. For the latter industry is seen as important player. It gives employment and can bring profit to communities (tax payer). At the same time industry's siting can be seen as a challenge due to its generating emissions, noise, risk with handling hazardous substances and/or transportation of dangerous goods. Industry can start small but may want to expand what may be a challenge too;
- (c) Industry is interested in producing its goods with an ultimate aim to make profit. At the same time, while running the business it complies with emission limit values, implements major accident prevention policy, carries out environmental impact assessment (EIA) for new developments or modernizations, is transparent in safety issues, feels part of the community and wants to be good neighbour. It expects to be informed on what is happening at the other side of the fence as well as anticipates approval by the communities to its plans for expansions;
- (d) Real estates developers are interested in turning blue-prints into bricks and making with it high investments' returns. In doing so they take investment risk due to changing market or fluctuating prices. They also aim at bringing boost to the region, give employment and contribute to achieving better standard of living and higher quality of infrastructure;

Session I continued with an interactive, real-world multimedia simulation that allowed a free-wheeling exchange of information and showed the different, and at times competing, points of view regarding planning and industrial safety.

The simulation presented the middle size town of Unch with plans to develop the residential areas including the required services for shopping, leisure, health and education. Indicators of performance referring to economy, quality of life, safety and environment were an important aspect in the simulation.

Three of the main players of the simulation – spatial planner, environmentalist and safety officer – had a role to oppose any development that would not score high on the performance indicator in their responsibility (town planner had economy and quality of life). Other two key players – developer and industry – had the respective roles to obtain the contract for the town development and the permit for expansion.

The developer presented three development plans, each one scoring differently on the performance indicators; the economy, quality of life, safety and the environment. The plans were then presented to the citizens of Unch (played by the seminar participants), who could vote to choose their preferred development after receiving information provided by the key players.

The citizens presented high level of awareness for sustainable development of their town and voted for the option that was closest to this approach, however they raised the point that the development plans were not presented for consultation to the industry.

By giving attention to the consultation aspect, citizens addressed a very important point. With the development being presented to the industry, it became clear that it was in conflict with the industry's plan for expansion.

The simulation thus clearly showed that the stakeholders can be driven by different interests.

It also triggered the seminar's participants – playing the role of citizens – having formulated a number of important points:

- Authorities should be proactive to identify groups of stakeholders whose interests may be affected through land use development projects and involve such groups at an early stage in those projects;
- Authorities should be transparent with the development projects; promote awareness and through it ensure active participation of relevant stakeholder groups (industry, public) in the development projects;
- Industry and public should take active part in the development projects if concerned by them and be open to look for constructive solutions;
- National authorities should take relevant steps to ensure that development processes are managed locally in an effective way;

The participants appreciated the simulation which showed clearly bad practice in leading a development process. In view of many, unfortunately, the reality is often a bad practice too, of which many may not be aware. Therefore they saw the simulation as a good basis for building awareness with authorities at the local level in the area of land use planning and safety and for inspiring them for establishing good cooperation and coordination in the development process.

Session II focused on sharing good practices and the availability of different instruments and policies for creating safe neighbourhoods around major hazardous industrial facilities. The following practices were presented:

- Spatial safety plans from Belgium,
- Consulting distances from Germany
- Safety distances from Switzerland, and
- Planning through negotiations from United Kingdom.

The presentations and two movies - introduction to and impression from the simulation - are available at the Convention's website at <http://www.unece.org/env/teia/welcome.html> (please navigate to the seminar)

Conclusions and recommendations

The participants concluded that safety aspects were not well integrated in land use planning and that cooperation was lacking between the main stakeholders. This situation was caused by only limited communication and no easy access to information. The participants pointed at lack of transparent procedures that should be contained in legislation and would give direct responsibilities to all the parties involved in the process of safety and land use planning.

The participants also concluded that experts should use available guidelines on safety and land use planning. The European Union Guidelines, which are open to the public, can be found in: <http://mahb.jrc.ec.europa.eu> and the eMARS database in <http://eMARS.jrc.ec.europa.eu>.

The participants to the joint seminar made a number of recommendations. They have been divided into recommendation to be taken at (i) national and (ii) international levels.

National level recommendations

- In order to ensure cooperation, countries should consider introducing transparent procedures that would impose cooperation or mandatory communication between parties involved in safety and land use planning at an early stage of any development. Alternatively a protocol setting obligation on 'who does what' should be introduced;
- Apart from procedures, protocols, etc. effective cooperation should be strengthened through organization of meetings for land use and safety agencies at national and local levels and aiming at building understanding and trust between them;
- In order to make easy access to information, Geographical Information Systems (GIS) should include risk assessments associated with the hazardous industrial sites, and/or databases with relevant information should be developed.
- Land use plans for areas in vicinities of hazardous industrial sites should be open for review by safety authorities before their approval;

International level recommendations:

- Having appreciated the joint seminar that brought together different stakeholders for the first time when discussing the safety and land use planning, the seminar's participants recognized the usefulness of the meeting and recommended that periodical meetings at international level be organized to discuss challenging cases in safety and land use planning and brainstorm on alternative developments scenarios, and through it identify possible solutions and learn from each other. Such meetings could involve serious gaming on land use and safety aspects;

- Criteria/standards for safety and land use planning incorporating long-term trends should be jointly developed by a group of safety and land use planning experts. These criteria/standards should consider different level of development by different countries;
- Publication containing best available practices on safety and land use planning and addressing clearly and simply the societal risks should be prepared;
- An advisory community on the web for discussing challenging cases could be considered.
