Further development of public participation in the site-selection and approval process of a final repository in Germany

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1. Introduction

Background

Public participation plays a vital role in the process of planning and licensing potentially hazardous and/or publicly disputed installations.

Major conflicts in the affected region may be avoided if the public or representatives are given the opportunity to participate already at an early stage of developing a project. Especially in contested projects, planning units or developers have sought to reduce the risk to fail at a late stage due to lack of public acceptance. Therefore public participation going beyond legal requirements has played an increasing role in the last years. This development can very clearly be observed also within the field of radioactive waste management 1, especially final disposal.

Research Activities

This paper reflects the first findings of a current research project funded by the German Federal Office for Radiation Protection and conducted by an interdisciplinary working group of the OEko-Institute. One focus of this project is the systematic analysis of past and existing participatory processes in different nuclear and non nuclear projects. On the basis of this analysis and a literature review a specific concept for public participation in the site-selection and approval process of a repository for high radioactive waste (HAW repository) in Germany will be derived. The concept shall foster transparency and acceptance.

The working group of the OEko-Institute combines long standing research experience and an intimate knowledge of radioactive waste management including political, technical, management and social problems of final disposal on the one hand. On the other hand members play an active role in stakeholder processes of different non nuclear projects as well as experience with a wide range of participative measures and their impact. This allows an approach which integrates the specific features of radioactive waste disposal with a wider perspective on the demands and opportunities of stakeholder processes.

¹ cf. e.g. publications of OECD/NEA and the Forum on Stakeholder Confidence (FSC)

The Current Situation in Germany

The procedure of site selection for a HAW repository in Germany still has to be specified [1]. The procedure introduced by the "Committee on a Site Selection Procedure for Repository Sites" (Arbeitskreis Auswahlverfahren Endlagerstandorte -AkEnd) [2] has not been adopted. The Committee had suggested installing a negotiation group to discuss the AkEnd proposals in the so called "Phase II" [3]. This suggestion could not be followed because not all relevant stakeholders were willing to participate. An internal draft for a federal law implementing main elements of the AKEnd findings was developed by the Ministry for Environment in 2005, but has never been brought to the cabinet. Due to the change of Government in Germany, the next steps still are under consideration. For these reasons a number of basic questions on final disposal are still unsolved today, e.g. the procedure of site selection and the extent of comparison of different sites, criteria for comparison and assessment of sites, financing of different measures as well as compensation and integration of local development. Therefore the concept to be developed by the Öko-Institut must follow a modular approach to make sure that it can be adjusted to future options for different procedural approaches for site selection.

2. Methodological Approach

With regard to the demands on transparency, public acceptance and the corresponding needs for public participation, there are many similarities between a HAW repository and other types of potentially hazardous and/or publicly disputed installations. Almost every affected country will only have one site with a HAW repository. Therefore it is necessary to derive as much information as possible from processes in other industries and in other countries to ensure a successful approach towards the unique project of planning and licensing a HAW repository..

The methodological approach of the current research project comprises a description and evaluation of 15 planning and approval processes of different nuclear and non-nuclear projects, each contentiously debated in public. These projects cover e. g. the enlargement of aviation capacities in Frankfurt, Vienna and South England, new building of high speed rail links in Germany and a rail tunnel in Austria, the site selection process for a dumping ground in the Main-Kinzig region (Germany), new building of the race course "Lausitzring" (Germany), site selection processes for nuclear waste repositories in Switzerland, Finland and Belgium and the licensing of 12 interim storage facilities for spent fuel in Germany. Views of different stakeholders and national as well as project specific characteristics are identified and will be considered.

The analyses cover the set of aspects listed in table 1. These aspects were identified as relevant

- to describe the measures of public participation,
- their links to the corresponding international and national legal framework,
- their integration into the formal and informal approval process,

the relevant political and societal background, conditions of the project and national specifics.

The systematic evaluation of the projects is accompanied by a detailed literature research and analysis and by a summary of international and national legal requirements. On this basis, positive strategies and measures of public participation are identified and evaluated under consideration of the demands of the German disposal process. A specific proposal for public involvement will finally be developed which addresses different steps of a siting procedure. It will cover recommendations for a strategy on public involvement and associated measures as well as for the consideration of socio-economic impacts. Also an estimation of costs of different measures will be given.

Table 1: Aspects for analysis of reference projects assigned to five categories

Category:	Aspects of analysis:
Procedural characteristics	Definition of the process in advance
	Iterative approach
	Comparison of alternatives
Public involvement	Information
	Dialogue
	Participation
	Effectiveness of the applied measures
Socioeconomic impact	Regional development
	Compensation
Financing	Costs
	Sponsors
Relevant conditions	Political impacts
	Legal requirements
	Relevant actors and stakeholders

The project is embedded in discussions with scientist and stakeholders in two stages: A first round will consist of a workshop with experts dealing with the scientific approach, legal requirements and first findings and results from project and literature analyses.

The second discussion in a larger circle of scientists and practitioners will take place on the basis of the draft results and proposed guidelines for public involvement for the HAW repository siting and licensing procedure. With this more extensive workshop it is intended to stimulate national discussion, improve the proposal where necessary and to foster a common understanding of the proposed measures for public involvement.

3. Two Examples: The Swiss Approach for Siting a Repository; The Vienna Airport Enlargement

3.1 Example: The Swiss Approach for Siting a Repository

The Siting Process for a Low-/Intermediate Level Waste Repository

Switzerland has a long tradition of participatory democracy. This has a strong influence especially on the early phases of the siting processes for repositories for low/intermediate level waste and for high level waste.

The siting process for a low-/intermediate level waste repository in the period between 1979 and 2002 shows several relations to the aspects named in table 1 in the categories "public involvement" and "procedural characteristics". These, however, had not been formally fixed as a defined siting procedure.

Measures of public involvement were based on Swiss legislation which ascribes the competence for mining activities to the cantonal level. During the siting process several measures for site characterizations had been subject to a cantonal mining concession which had been put to cantonal referenda. Due to this procedure, the local public of those sites which had been chosen and examined as potential repository sites

- had been informed by the applicant using different media of information,
- could express opinions and communicate with the applicant and experts in local assemblies and
- had the final decision on the mining concessions by cantonal referendum.

Furthermore the siting procedure for the low-/intermediate level waste repository followed a stepwise approach including reduction of possible sites in a selective process [4].

Nevertheless, the application for the general license for a repository at the Wellenberg site failed in 1995 due to the rejection of the necessary mining concession at the cantonal referendum. In 2002 the concession for an exploratory gallery at the same site was rejected at a cantonal referendum as well [5]. In retrospective, a break in the selection procedure was identified as the most relevant reason for public disagreement: The Wellenberg site already had been rejected as a candidate site in the second selection step, but had later been reintroduced into the procedure. The reasons and the background for this reintroduction were not communicated at the time in a transparent way and could not be completely understood by the public [4].

These experiences underline the necessity of a traceable stepwise approach which also allows the return to an earlier step if iteration is needed due to new developments. Transparency is a necessary condition for public acceptance. The procedure and the criteria used in the different steps must therefore be fixed and clearly communicated in advance. The advantages of a stepwise approach including reversibility of decisions are also pointed out by the Forum on Stakeholder Confidence of the OCED/NEA, e.g. in [6].

Current developments

The latest developments in Switzerland can be understood as a reaction to the Wellenberg experience and international evolutions:

- 1. The new Nuclear Energy Act, in force since February 2005, stipulates that the concessions for site explorations are granted according to nuclear law that bundle any other licenses which are necessary according to federal law. Cantonal concessions are not necessary. The need for a cantonal referendum has been replaced by a facultative referendum at the general license on the federal level.
- 2. The federal authorities are currently developing a procedure for the siting process. It will define a stepwise procedure and criteria for site selection as well as requirements for public participation. According to [5] the procedure will focus mainly on safety related criteria, but socioeconomic aspects will also be taken into account. Cantons and neighbouring countries will be involved in the elaboration of the site selection procedure.

Key messages:

- Final disposal as a national task with high potential for social and political conflicts needs careful evaluation concerning the distribution of competencies on the federal and the cantonal/regional level. Realisation of the national responsibility may require concentration of competencies on the federal level.
- Measures of public involvement and participation need to be embedded into a stepwise procedure which is clearly defined, publicly known and discussed in advance. It should promote transparency concerning the process and the relevant criteria applied in the different steps as well as the integration of public participation and the influence of public opinion on decisions and further developments.

3.2 Example: The Vienna Airport Enlargement

In summer 2005, after five years of negotiation, one of the largest mediation processes on environmental matters successfully ended with the signature of a system of contracts. They ensure the development of a third runway of the Vienna airport according to concrete stipulations on the one hand and several measures to limit aviation noise and its negative effects as well as to foster regional development and the setting up of a substantive fund for environmentally or socially oriented projects. The contracts also foresee the relinquishment of the right to legal redress against the permit of the enlargement of all stakeholders involved and a mechanism how open questions or future disputes shall be settled. This far reaching agreement in a field that in most other cases has created tension and political conflict has widely attracted interest. The success factors should thus be briefly analysed.

Main steps of the mediation process

In the late 1990ies it became clear for the Vienna airport operator, that from 2010 the existing capacity of the airport would not be sufficient any more. In order to develop solutions that are compatible with other regional needs and to openly discuss the different interests, the airport decided to try to establish dialogue with its neighbouring municipalities, local initiatives against a third runway and public au-

thorities. A well known Viennese lawyer and mediator was hired as process provider who as a first task should screen the options and provide for the further development and implementation of this idea. This provider has organised and accompanied the whole process until the final conclusion. The process was backed by the respective regions and the national government.

After several weeks with informal separate negotiations to identify the needs and conditions of the main stakeholders, in spring 2000 a group was officially installed to prepare for a mediation process. The preparation group consisted of 12 representatives from the municipalities, initiatives, airport and regional authorities and was led by the process provider. The main tasks of this group were to define the goal of the mediation, to appoint a team of three mediators and to decide who should participate in the mediation. For the mediation team a European tender was carried out. In January 2001 the first session of the mediation forum took place. It had been a precondition of the anti-noise initiatives, that before negotiating a third runway, there should be measures put into place to reduce noise and better protect neighbours under the current runway system. In May 2003 a first part of the treaties was signed by 50 parties addressing concrete measures to be implemented by 2004.

The mediation forum had a steering group and several working groups. The discussions and results of the process were continuously documented and published. The mediation team pursued a proactive strategy to communicate with the media. The results after the final negotiations in 2005 were positively received by the regional and national government and all political parties.

The process has been extensively documented in [7].

Key messages:

- An explicit, open and patient scoping phase on the expectations of the stakeholders and the clear definition of the aims, procedural rules and legal implications are necessary when a legally binding compromise shall be generated
- Creating a consensus needs time and patience. A time frame that is so tight that stakeholders feel rushed, can contribute to suspicion and can prevent the development of compromises. It can be necessary to accept preconditions and realise concrete measures for confidence-building.
- A process that is intended to create a binding commitment of the involved stakeholders must be backed by the administration and politics. If it is unsure whether all aspects of a compromise will later be accepted by the government, the chance to bring stakeholders to concede might be weakened.

4. Lessons learned

The examples outlined above highlight the two key issues which the development of a strategy for public involvement deals with:

- Consideration of the political and societal conditions that influence a project and
- Elaboration of the main organisational features and their application to the different stages of the process.

The analyses of the 15 reference projects prove that both issues are satisfactorily covered by the aspects listed in table 1.

Most of the projects had measures applied for public involvement that go beyond legal requirements. However, a range of new standards has been set in the past years on the European level and has been implemented in the national law. Most relevant are the requirements for a strategic impact assessment (SEA) which requires early involvement of the public and includes the assessment of alternative sites. As SEA is a new instrument there is still a lack of practise and little case law concerning the realisation of the SEA requirements, e.g. the extent of assessments of alternative sites. But it is for sure that old-fashioned decide-announce-and-defend strategies are no longer acceptable under the modernized legal framework.

The German legal system does not foresee extensive legally binding direct participation on local levels. In most regional states the possibilities for local referendums etc. – if they exist – are especially limited when it comes to projects that require a formal planning and approval procedure as it is the case with a repository. Therefore a concept for public involvement in that respect must rely on voluntary forms of participation such as long-term dialogue forums, local working groups, round tables, discussion panels or public opinion polls..

The legal requirements especially for the SEA and EIA procedures on the one hand and past experience in nuclear waste management on the other hand reveal that early public involvement is not a voluntary good-will act. Basic elements must be included and violations can stop a project for good. In some disputed projects, additional elements and efforts to include stakeholders and the public in the development and decision making processes seems to be the only way to overcome continual conflicts. This seems especially true in the special case of a HAW repository, where the gap between scientific expertise, societal needs and the lack of clear conditions as well as society's mistrust against all kinds of nuclear activities are among the hurdles that prevent progress.

In order to raise public awareness of the importance of nuclear waste disposal and to develop public acceptance, the key features of the siting and approval procedure should be fixed in a "pre-procedural" stage. As stated in the Swiss example, this phase involves the public to achieve a broad basis of understanding and a high degree of acceptance of the design of the key features.

In the German case, this phase should also offer a platform where the main points of conflict are discussed between the relevant stakeholders and brought to a solution to overcome the current situation of virtual standstill.

The reference projects also highlight the relevance to consider the socioeconomic impacts of major industrial or infrastructural activities. Independent expertise on regional development scenarios can serve as a basis for further discussion in the affected public. Experience shows that these questions raise more concerns and are of higher interest in the affected communities than e.g. details of technical realisation. Local representatives and the citizens with their expertise on the regional conditions should be strongly involved in all issues of socioeconomic impacts and regional development.

5. Further steps

The design of the pre-procedural phase is currently of highest importance. A proposal will be finalised shortly as a first result of the project. The evaluation of the reference projects and literature will go into more detail to spot the relevant measures of public involvement, their impact and their possible success in relation to different steps of the procedure. When developing the proposal, the integration of formal and informal measures of public participation in formal procedures will be considered as well as the implementation of regional development in the process. After a discussion of the proposal in a workshop with scientists and practitioners in spring 2007 the final results will be presented in summer 2007.

Limited information currently is available on the costs related to special measures. This is mainly due to the fact that costs for public bodies for their efforts for public involvement are not being documented separately. Nevertheless, this aspect will be relevant for the final definition of the design of the siting and approval procedure and for this reason will be subject to further analyses. On the other hand it has to be considered that costs associated to certain measures of public involvement cover only one side of the balance, while the other side, namely the one of economical advantages and saving of costs for litigation that might result for the whole process, is even more difficult to figure out.

The next steps in the disposal procedure in Germany are subject to political decisions. When agreements on the key features of the siting and approval process will be made, the proposal for public involvement can be further concretised with respect to the different steps of the procedure and their specific requirements.

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