Strategic Environmental Assessment for local transport plans (FOPS 73.0327/2004)

Abridged report

The strategic environmental assessment (SEA) makes new demands also for plans and programs in the transport sector. Particularly on local level transport is one of the biggest causes of negative environmental effects. But there does not exist a SEA obligation for local transport plans, however many factors suggest performing such an examination in this sector (see capture 2.1):

- Environmental concerns can be considered not only on project level but on strategic level. In particular CO2-Emissions, laminar cumulative noise pollution and dissection of landscape can be implicated.

- Concerns of the European directive referring to the air quality and the EU directive referring to environmental noise can early be considered.

- Synergies and learning-effects can be won for other local environmental assessments (e.g. public transport planning, town planning, noise-action-planning).

- Following planning and admission decisions can be safeguarded and discharged of content.

- Several actors and different environmental requirements in the transport planning are bundled in one planning process.

- The acceptance of the transport planning can be increased on all planning levels by dint of an early engagement and a transparent planning.

One aim of the research project was to provide a manual for the local municipalities to integrate a SEA into the local transport planning process. The professional basis is formed of a detailed analysis of the legal and technical circumstances as well as a survey of numerous municipalities concerning their previous practice of the local transport and environmental planning.

Legal basis

As legal basis in the research-project the substantial legal bases of the strategic environmental assessment from the SEA-guideline, the law for the environmental impact assessment (UVPG) and building law (BauGB) were arranged (chapter 3). The local transport plan has to be assigned to on the one hand the special planning as transport planning and on the other hand it is part of local land use planning and stands in the context of the local zoning plan. Therefore it is meaningful to take both requirements in a view: the requirements of the UVPG on the one hand and the requirements of the BauGB on the other hand. Accordingly the manual considers beside the UVPG also the requirements of the BauGB. Although no definite obligation for the SEA-performance for the local transport plan can be derived, it is
meaningfully in particular for the discharge of the SEA´s requirements for other local plans (local zoning plan, landscape plan) to align the SEA recommendations at the legal bases for the transport plan.

The SEA is conceived as a decision-preparing, environmental-referred procedure in the context of the production of plans or programs, whose execution has possibly effects on the environment. The SEA serves bringing environmental interests as promptly as possible, all-embracing, transparency and systematically into the planning and decision-making process. The result of the SEA has to be considered in the context of the planning decision. An absolute priority of the environmental interests against other interests is not connected with it. The authority must argue only with the result of the SEA in the context of its consideration decision. The following work procedures have to be legally prescribed in the context of a SEA:

- **Scoping** - similar to the Environmental Impact Assessment the early definition of the analysis framework for the Environmental Report is intended also for the SEA. The concerned authorities have to be consulted.

- **Environmental Report** - for the documentation of the treated contents in the context of an environmental assessment an Environmental Report has to be provided. The Environmental Report has to be compiled in the process of the environmental assessment - optimally accompanying the process - during elaboration and before the acceptance of the plan or program and its bringing into the legislative procedure. The report represents one - appropriately separate - part of the plan documentation.

- **Participation of domestic and transnational authorities and public participation** – a substantial component of the SUP is the participation of concerned authorities as well as the concerned public. If transnational effects have to be expected, this concerns also the authorities and the public of the neighbouring EUROPEAN UNION or non-European Union state.

- **Consideration of the results during decision making** – the result of the SEA documented in the Environmental Report, (i.e. the rating statements to the substantial impact on the environment of the plan which can be expected as well as the cognitions from the authority and public participation) have to be considered in the decision over the plan. Consideration means that at least a contentwise argument with the results of the environmental check takes place.

- **Publication of the decision** – the decision over the plan has to be announced in relation to the involved authorities, the public as well as the member and/or neighbour states if necessary. In case of the acceptance of the plan 1) the accepted plan, 2) a recapitulatory explanation how environmental considerations were included into the plan, like the Environmental Report, which delivered statements and the results of led consultations were considered and for what reason the accepted plan was chosen, after consideration with the examined reasonable alternatives, and 3) the measures, which were decided for monitoring have to lay out publicly.

- **Monitoring of environmental impacts** – the SEA demands – contrary to the Environmental Impact Assessment – a monitoring of the substantial environmental impacts caused by the plan. Early in particular unexpected negative effects have to be determined, with
which the purpose is pursued to put the member states into the position to get suitable remedies.

**State of the art**

In chapter 4 the state of the art of local transport planning and the SEA are presented. It is to emphasize that that local transport planning does not always fulfill the placed expectations. The requirement of an integrative and sustainable transport planning fails frequently because of practical obligations in the municipality. Experiences with the SEA and methodical guidances for the SEA concerning the transport sector exist particularly on the level of spacious transport infrastructure plans (e.g. German federal road traffic plan). The realizations won thereby, combined for example in the “Merkblatt” (instruction card) for the SEA of plans and programs in the transport sector (working comitee network design at the FGSV 2004), can partly be transferred to the local level.

**Case studies**

Chapters 5 and 6 document the results of the example-municipalities’ survey. A detailed view was brought by the planning practice of the transport, building and environmental planning of the three case examples Munich, Rostock and Taunusstein (chapter 6).

It has been shown that in all cities already partly differentiated environmental-referred examples and target systems, and also for the transport planning usually independent target systems were defined. But it has to be pointed out that a certain discrepancy exists between the documented target systems and the concrete measure selection process in the transport plan. It is not frequently clear in which extent the determined measures could reach the targets and in which manner these results flows into the decision-making process. Those targets, which are concrete and operable, defined, possess practical relevance.

An alternative-examination takes regularly place in the local transport planning process on the level of abstract scenarios. Selected measures were confronted with one another first, without knowing clearly whether there are not further meaningful measure combinations. The alternative-discussion and -decision on the measure level is usually not documented. Closely connected is the problem that the environmental offices are taken part within the planning process, but they are normally not involved with the closing decision over the choosen local transport plan’s measures.

Participation processes frequently play a large role in transport planning and sometimes-much expenditure is partly operated, in order to merge carriers of public interests and the public. However it is to be stated that mostly meetings with predominant information function were held. A genuine decision’s co-operation of these is only rarely aimed. Nevertheless is has to be assumed that the local transport plan’s participation processes fulfill widely the SEA’s public participation requirements.

Good experiences were gained particularly with office-spreading working groups as constant mechanism (e.g. workinggroup ecological zoning plan or workinggroup noise reduction/air pollution reduction planning or workinggroup transport planning and town development) or as
Deficiencies exist so far however regarding a regional acclamation with surrounding municipalities. A Scoping was usually not accomplished for a local transport plan so far and must therefore be supplemented by introducing a SEA. Experiences can be used municipalities already won in frame of zoning plan and the Environmental Impact Assessment.

Regarding the co-ordination between transport planning and the alignment of other plans with contentwise interfaces for transport planning no uniform practice exists so far. In Rostock good experiences were made with a temporally shifted alignment of the zoning plan and the local transport plan, because thereby a mutual control of the plans was possible. With a temporal parallelism of planning the danger of the excessive demand is seen turned around by administration and citizen. Opposite in Munich the transport planners favored the model of a parallel development updating of zoning plan and local transport plan, because only with such a procedure the reciprocal effects between transport and settlement development can be mastered optimally. Also noise reduction, clean and landscape planning were accomplished so far temporally to a large extent independently of transport planning. Because with all plans both organizational and contentwise points of constraint exist, which can be completely integrated only with difficulty, also in the future the example of integrated planning will be difficult to be converted.

The decision structures in transport planning are similar in all regarded cities. After a municipality office participation the responsible office for transport planning provides a resolution, which is discussed and decided in the political committees (committees, city council). The environmental offices are taken part in certain phases within the planning process, but into the closing decision making over the transport plan’s measures they become only little included. For outstanding ones it is difficult so far to reconstruct these single decisions within the planning process referring to the selection of individual measures. The documentation obligations of the SEA could be used in order to make the actual decision-making process more transparent.

At present monitoring concepts are going to be developed in several cities in order to derive a priority list of the measures and to be able to get a purposeful annual budgetary planning and budgetary appropriation distribution. Opposite to that an effect-monitoring referred to these measures and their environmental effects, as it is required by the SEA, exists in no city. Here methodical new ground has to be entered. However partly already existing beginnings for the environmental monitoring can be used, which were developed for the SEA in the zoning plan. Here is to emphasize the city Rostock, which wants to furnish an indicator-supported municipality-far environmental-report-reimbursement-system. Such an indicator system could be purposefully begun also for the monitoring of measures’ impacts on the environment and be extended purposefully by transport-referring environmental indicators.

Manual

The manual is submitted in a separate document and contains the experiences won in the local case studies. It also gives recommendations based of the German laws like the law of Environmental Impact Assessment (Gesetz über die Umweltverträglichkeitsprüfung UVPG).
and the building law (Baugesetzbuch BauGB) for a professionally founded SEA in connection to a transport planning process. Addressees are transport, environmental and town development planners in municipalities or planning offices involved in the updating or new disposition of a local transport plan. The manual was comprehensively discussed in a scientific advisory council and updated accordingly. The manual is structured basing of the particular local transport planning process steps taking the accordant SEA-modules into account.

Because local transport plans can include very different issues in individual cases and also the planning process differs between the different municipalities, there exist appropriate borders for the concretizing degree of the manual. The manual contains therefore no finished „cook prescriptions“ or methodical SEA-techniques and -practices for the individual cases, but it essentially gives recommendations regarding which components of a SEA have to be worked out in which planning step and to which professional and content aspects thereby have to be particularly paid attention. To the legal regulations of the UVPG and the BauGB is referred concretely. Following guidelines and/or basic considerations are the basis for the formal and contentwise arrangement of the manual:

- The manual should have a limited extent and should be easily understandably, clear and well readable.
- In order to avoid an overload of the presentation, the manual concentrates on the application of a transport plan. The remarks can also be transferred however to a large extent to a public transport plan.
- The manual is divided into three main parts: After the description of the substantial principles of a SEA for the local transport plan (part B) a description of the proceeding takes place on the basis of the individual process steps (part C). In the third part (part D) tools are made available, which contain deepening references, check lists and „Best Practice“-examples to the individual work procedures.
- As substantial principles of the SEA for the local transport plan the manual stresses the integration of the SEA in the local transport planning process, the processful production of the Environmental Report, the target-orientation of the SEA and the constant cooperation of environmental offices and transport planners. Beyond that the linkage with other local planning is emphasized in order to use synergies purposefully.
- Although the manual primarily described the components of the SEA, it is structured to the main-phases of the local transport planning process. This justifies itself with the fact that the SEA as dependent procedure must be integrated into the procedure of the local transport plan alignment. The process of transport planning is only described so far, as this is necessary to understand the linkage between SEA and transport planning.
- From contentwise view the manual makes no rigid defaults, which environmental interests, aims and conscious indicators with the SEA in the transport planning have to be regarded. Instead of this a comprehensive tabular synopsis of transport-referred and local environmental targets and - indicators documented in the literature were created, from which targets and indicators can be selected. Consciously a statement is avoided in addition how many environmental topics and/or environmental indicators for a transport planning are appropriate. One points out that an emphasis setting on a limited selection of particularly relevant environmental topics is meaningful.

- The SEA has the task to optimize the measure selection process from environmental view and to document this in the Environmental Report. The handbook assumes that the SEA can seize in principle different decision levels of the measure selection process, i.e. decisions over:
  - Individual measures,
  - spatially or essentially definable measures and
  - an overall measure catalog (as sum of all individual measures and measure-pack).

If certain local-specific transport strategies at the basis (e.g. environmental zones, surface covering traffic noise abatement, town center duty o.ä.) are already put to the development scenarios, then also this level can be item of the SEA. Which levels of an environmental check are submitted depends on the concrete conception of the local transport plan and the question, which decisions in the transport plan have to be made explicitly.