GENERAL DESCRIPTION OF DECISION SUPPORT TOOL IN CLIMATE CHANGE

There is at present a growing need for tools that could be used at an early stage of water management and other climate and climate change related adaption process. Within SAWA a decision process tool has been tested and further developed. The aim of the tool is to incorporate sustainability in a simple manner in the planning process of land use management. The aim with the tool is to provide a checklist and a methodology that promotes discussions in order to facilitate the identification and compilation of potential measures or strategies and consequences related to land use issues. In addition, it should contribute to a more transparent decision process and increase the traceability of the reasoning behind the decisions taken.

The tool is based on classic technical risk- and vulnerability analysis, comprising all steps from risk/hazard identification to appraisal of measures. The main difference, between this risk analysis tool and many others is the allowance of comparisons of present risks and consequences of measures early in the process. In addition, the methodology repeats the risk/consequence comparison in an iterative manner during the full process until the final step (proposal for decision) has been reached.

The tool is intended to be used by both experts and policy makers (or persons who will present the alternatives for the policy makers) in order to demonstrate all kinds of consequences and present them to the whole group of stakeholders (experts, policy makers, the public etc.).

Within the Interrreg IVB project SAWA (Strategic Alliance for integrated Water Management Actions) the tool has been tested. The tool has been tested by SGI in in municipalities i.e. Lidköping, Göteborg and Arvika in Sweden, and Melhus in Norway in cooperation with SAWA partners in Lidköping municipality, NVE (Norwegian Water Resources and Energy Directorate) and Melhus municipality in Norway.

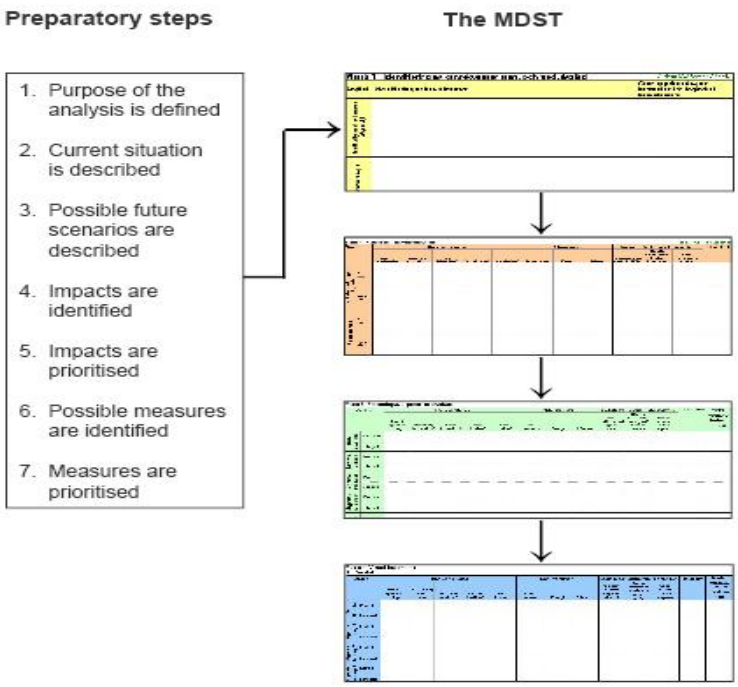

Figure 1 The MDST and its preparatory steps (from Varia 613).

Case studies

In order to test the applicability of the tool it has been tested by desk based case studies in co-operation with civil servants. It has been tested in the municipals Arvika, Göteborg and Lidköping in Sweden and Melhus in Norway. Within the framework of SAWA partners in Lidköping municipality (Sweden), NVE and Melhus municipality (Norway) have been involved. Within the framework of the Interreg project CPA, co-operation partners from Arvika have been involved, and the tool has further been tested in Göteborg municipality within the framework of the Formas funded project "Enhancing cities capacity to manage climate change".

In all case studies, the impact of flooding due to increased water levels and/or increased precipitation has been taken into concern. Climate change is expected to profoundly influence the hydrology of Sweden and northern Europe.