

Summary P1006 0- What about the peat area's?

Project number : P1006
 Short title : What about the peat areas?
 Type/Theme : Bridge project
 Estimated costs :

Consortium

	Stakeholders	Contact
Consortium leader	Alterra	dr. C. Kwakernaak
Other members	Ministry of Agriculture, Nature and Food Quality (LNV) Ministry of Housing, Spatial planning and the Environment (VROM) Province of Zuid-Holland Province of Utrecht Etc.	R.D. Stam F. Van Maarseveen E. Weijdema W. Dijkman

Something must be done in order to preserve the peat meadow areas in the Western part of the Netherlands for the long term. To preserve the meadows, drainage of the area is essential, but drainage leads to compaction of the peat, higher drainage costs and increases salination. Together with all interested parties, we must develop a coherent vision regarding peat meadow areas, taking into account the aspects of water management, soil, use of space and climate.

Objective and bottlenecks

Interactively develop and mobilize knowledge regarding the long-term consequences of dehydration in relation to the use of space and nature in the Western peat meadow area.

There is a dilemma related to the future of the peat meadow areas: either preservation of the areas by continuous dehydration or preservation of the peat. Continuous dehydration results in soil subsidence of 0.5 to 2 m per 100 years, it damages foundations and infrastructure and leads to more salination and higher drainage costs. Dairy farms are under pressure because of agricultural reforms and increasing urbanization. Water quality is another bottleneck, especially with the implementation of the European Water Framework Directive (EWFD).





Plan of approach

The project is conducted and supervised by a broad consortium of parties from the domains of policy , management, use and research into the peat-meadow areas. The consortium functions as a Community of Practice: a group of people learning from the free exchange of knowledge and applying this knowledge. Moreover, the intention is to include the project in a 'Bridge Project on Peat Meadows', where the project will collaborate with the Bsik programmes 'Climate changes Spatial Planning', 'Innovative use of space' and 'Delft Cluster'. This integral approach is expected to provide an important base for a cohesive vision regarding peat meadow areas taking into account: water management, water quality, soil, use of space, nature and climate. The project is sub-divided into three lines of research:

- A. Predicting the effect of various water level management strategies for the short, intermediate and long term;
- B. Conducting experimental field research with innovative water level management and exchange with area processes with transitions in water management (such as Gouwe Wiericke West);
- C. Amassing missing social and scientific knowledge as a basis for transitions in the Western peat meadow area.

Results

- Insight into the consequences of dehydration strategies
- Possibilities for innovative use of space in relation to dehydration strategies
- Insight into the costs and the benefits (foundations, water management, infrastructure) of dehydration strategies
- Assessing the consequences of the various dehydration strategies on space usage
- Sustainable institutional arrangements for changes in water management
- Improved prediction methods for nature recovery in grass lands in case of water level adaptation
- Knowledge on transitions in water management and spatial design

Final result

A perception of the long-term developments in the peat meadow areas and the possibilities to influence these developments via water management. This involves an integral approach in which water management, use of space and the environment and climate are considered in their mutual relationship.

Key words