



## **Mapping natural resource conservation and land degradation in South Africa**

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The Land Degradation Assessment in Drylands Programme (LADA) of the FAO aims to develop and implement strategies, tools and methods to assess and quantify land degradation and soil conservation at different temporal and spatial scales. It is also aimed at building national, regional and global assessment capacities in order to design and plan interventions to mitigate land degradation and establish sustainable land use management practices. South Africa is one of six pilot countries participating in the LADA programme. The World Overview of Conservation Approaches and Technologies (WOCAT) has as mission to support innovation and decision making processes in Sustainable Land Management (SLM), particularly in connection with Soil and Water Conservation (SWC). The aims and missions of LADA and WOCAT are complementary and in order to enhance synergy, the Questionnaire for Mapping Land Degradation and Sustainable Land Management is being used as basis to map and document land degradation and land improvement at a national scale in a unique, common way. Therefore, a participatory, decentralized and integrated approach is used in degradation assessments and ample use is made of participatory appraisals, expert assessment, field measurement, remote sensing, GIS, modelling and other modern means for data generation, networking and communication to share information at local, national and international levels. South Africa commenced in February 2008 with their LADA assessments both at national and local level. The ultimate goal of these assessments is to obtain a picture of the distribution and characteristics of land degradation and soil and water conservation activities in South Africa. The final output will be national

maps of the land degradation status, causes and impacts and the SWC status and impacts for major land use systems in the country. This paper focuses on describing the methodology and approach used during the initial assessments with specific emphasis on the participatory approaches followed in data collection and knowledge sharing in conducting clear and informative assessments. The DPSIR framework and a Land Degradation Index will be explained as basis to analyse data and to map land degradation and soil conservation in the Mpumalanga Province of South Africa.