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ISPA Vision statement

My research has mainly addressed two core areas in the domain of precision farming and smart farming technologies.

Firstly, I have studied the economic and environmental impact of PA and smart farming technologies in Europe for the last 20 years to look for economic feasible and environmental friendly solutions.

Secondly, I have conducted numerous studies on adoption of PA technologies and systems in Europe to understand farmers and other farm experts´ perception of new developments in PA technology.

My research has mainly dealt with the economics of GNSS based decision support systems. I have tried to understand, which farm segments that seems to adopt and benefit from various PA innovations in the last 20 years. Most studies and surveys have taken place in Europe (Denmark, UK, Germany, Finland and Greece) including studies on auto-steering systems and other systems such as controlled traffic farming, but also studies on farm technology in Africa and Asia. In all I have attempted to understand farmers reasons for adopting or not-adopting climate smart technology in the agribusiness sector.

Current projects are in collaboration with other European universities and private partners, including the recent EU-project, BEATLES on behavioral economics of climate smart agricultural technologies and Robs4crops that focus on development and implementation of sustainable agricultural robots in Europe. Also the recent European ICT-Agri projects: CTF-optimove, PAMCOBA and the Danish Future Cropping project have also focus on the development of sustainable PA farming systems.

To further promote the role of PA and other smart farming technology, I believe that an interactive collaboration between scientific disciplines such as agronomics, software development, image analysis, engineering, economics and environmental impact assessment is needed to further develop sustainable PA solutions. To do so, it is important that both industry, farmers, advisors, research institutions, public authorities and other value chain actors collaborate to develop solutions that are financial viable, environmental and climate smart as well as user friendly and compatibility with common standards.

My previous experience can draw on existing knowledge about environmental cost and benefit analysis and farmers interest to adopt climate smart solutions and feasibility studies of PA and automated farming systems in Europe. In addition, I will bring knowledge about externalities, market and non-market price information from existing project coordination and participation in collaborative EU projects.