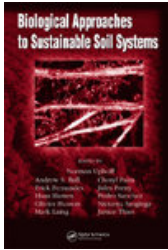


## Biological Approaches to Sustainable Soil Systems

Edited by Norman Uphoff, Andrew S. Ball, Erick Fernandes, Hans Herren, Olivier Husson, Mark Laing, Cheryl Palm, Jules Pretty and Pedro Sanchez  
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- Integrates soil system analysis with the strategies and methods for creating sustainable soil systems
- Compiles the work of more than 100 international authorities representing a broad spectrum of disciplines
- Explores soil systems in the tropics, temperate zones, and arid and semi-arid conditions
- Relates the subject to wider social and economic issues

Global agriculture is now at the crossroads. The Green Revolution of the last century, which helped developing countries meet their food needs for several decades, is now losing momentum. Rates of growth in food production are now declining, with land and water resources becoming scarcer, while world population continues to grow. We need to continue to identify and share the knowledge that will support successful and sustainable agriculture systems in this new century. These depend crucially on soil.

Biological Approaches to Sustainable Soil Systems brings together 102 experts from multiple disciplines and 28 countries to report on the science and the innovation going on for sustainable soil-system management. While accepting some continuing role for chemical and other external inputs in 21st-century agriculture, this book presents a variety of ways in which crops can be produced more abundantly and more cheaply with lessened dependence on the exogenous resources that have driven the expansion of agriculture in the past.

Including the work of both researchers and practitioners around the world, Biological Approaches to Sustainable Soil Systems

- Explores problems and solutions for soil systems in a variety of climate conditions
- Discusses the importance of symbiotic relationships between plants and soil organisms, looking at crops as integral and interdependent participants in ecosystems
- Seeks to reduce the distance between scientific research and technical practice
- Examines related considerations such as pest and disease control, climatic change, methods for fertility restoration, and measurement, monitoring and modeling to improve soil-system management

With 50 self-contained chapters, this original work provides researchers, practitioners, planners, and policy makers with a comprehensive understanding of the science and steps needed to utilize soil systems for the long-term benefit of humankind and the environment.

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