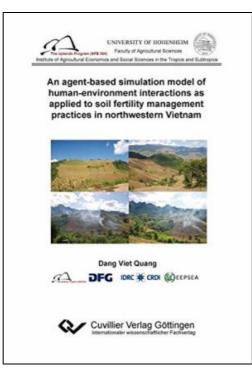
An agent-based simulation model of human-environment interactions as applied to soil fertility management practices in northwestern Vietnam



Filesize: 6.13 MB

Reviews

It in a single of my favorite publication. I have read and so i am sure that i will likely to study again once again down the road. I am delighted to let you know that this is basically the greatest publication we have read inside my own life and might be he best pdf for possibly.

(Maria Morar)

AN AGENT-BASED SIMULATION MODEL OF HUMAN-ENVIRONMENT INTERACTIONS AS APPLIED TO SOIL FERTILITY MANAGEMENT PRACTICES IN NORTHWESTERN VIETNAM



Cuvillier Verlag Jul 2012, 2012. Taschenbuch. Book Condition: Neu. 211x149x9 mm. Neuware - Intensification agriculture on sloping land in northwestern Vietnam has increased soil erosion and declined the soil fertility. In response to this decline in soil fertility, as well high output prices, highland farmers have increasingly turned to mineral fertilizers and high yielding varieties, and the rapid adoption of these has partly compensated for the underlying resource degradation process. However, these practices are not environmentally sustainable, and so long-term farm income levels could decline as a result. The objective of this studies is to explore the relationship between the decisions made within farm households and biophysical dynamics - such as soil erosion and soil fertility change, in order to assess how the introduction of soil conservation practices affects soil fertility and farm household incomes, to identify possible constraints on the adoption of soil conservation practices, quantify trade-offs between sustainability and the income of farm households, and to appraise the possible policy options available in order to promote the adoption of soil conservation practices. The studies applied an integrated model using a software package called `Mathematical Programming-based Multi-Agent Systems¿ (MP-MAS) in combination processes manipulated using the Tropical Soil Productivity Calculator (TSPC). The model was calibrated to cover a 22.58 km2 catchment area in northwestern Vietnam that included 471 farm households, with each farm represented as an individual agent in the model. The results of the simulation showed that an increased use of mineral fertilizers improved crop yields and reduced soil nutrient losses. When soil conservation practices were included into the decision-making model, the area of land under these techniques remained low. The main constraints to the use of soil conservation practices identified included low crop yields and high labor requirements when compared to conventional pract

Read An agent-based simulation model of human-environment interactions as applied to soil fertility management practices in northwestern Vietnam Online

Download PDF An agent-based simulation model of human-environment interactions as applied to soil fertility management practices in northwestern Vietnam

Related Kindle Books

\rightarrow

Children s Educational Book: Junior Leonardo Da Vinci: An Introduction to the Art, Science and Inventions of This Great Genius. Age 7 8 9 10 Year-Olds. [Us English]

Createspace, United States, 2013. Paperback. Book Condition: New. 254 x 178 mm. Language: English . Brand New Book ***** Print on Demand *****. ABOUT SMART READS for Kids . Love Art, Love Learning Welcome. Designed to... Read eBook >

\rightarrow	

Six Steps to Inclusive Preschool Curriculum: A UDL-Based Framework for Children's School Success Brookes Publishing Co. Paperback. Book Condition: new. BRAND NEW, Six Steps to Inclusive Preschool Curriculum: A UDL-Based Framework for Children's School Success, Eva M. Horn, Susan B. Palmer, Gretchen D. Butera, Joan A. Lieber, How... Read eBook »

\rightarrow	

Children s Educational Book Junior Leonardo Da Vinci : An Introduction to the Art, Science and Inventions of This Great Genius Age 7 8 9 10 Year-Olds. [British English]

Createspace, United States, 2013. Paperback. Book Condition: New. 248 x 170 mm. Language: English . Brand New Book ***** Print on Demand *****. ABOUT SMART READS for Kids . Love Art, Love Learning Welcome. Designed to... Read eBook >

\rightarrow

DK Readers Day at Greenhill Farm Level 1 Beginning to Read

DK CHILDREN. Paperback. Book Condition: New. Paperback. 32 pages. Dimensions: 8.8in. x 5.7in. x 0.2in.This Level 1 book is appropriate for children who are just beginning to read. When the rooster crows, Greenhill Farm springs... Read eBook >

\rightarrow	

The Trouble with Trucks: First Reading Book for 3 to 5 Year Olds

Anness Publishing. Paperback. Book Condition: new. BRAND NEW, The Trouble with Trucks: First Reading Book for 3 to 5 Year Olds, Nicola Baxter, Geoff Ball, This is a super-size first reading book for 3-5 year... Read eBook >