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| Disciplina              | 628  |
| Soggetti                | Management information systems<br>Software engineering<br>Environmental management<br>Computers<br>Environmental sciences<br>Business Information Systems<br>Software Engineering/Programming and Operating Systems<br>Environmental Management<br>Business IT Infrastructure<br>Information Systems and Communication Service<br>Environmental Science and Engineering  |
| Lingua di pubblicazione | Inglese  |
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| Livello bibliografico   | Monografia   |
| Note generali           | Description based upon print version of record.  |
| Nota di bibliografia    | Includes bibliographical references at the end of each chapters.   |
| Nota di contenuto       | Preface; Contents; Contribution of Mobile Phones to Township Livelihood Outcomes in the Western Cape Province of South Africa; 1 Introduction; 2 Literature Review; 2.1 The Role of Mobile Phones in Poverty Reduction; 2.2 The Sustainable Livelihoods Framework; 2.3 Livelihood Assets; 2.4 Transforming Structures and Processes; 2.5 Livelihood Outcomes; 2.6 Identified Gaps and Expected Contribution of the Study; 3 Research Method; 4 Results and Discussion; 4.1 Livelihood Outcomes; 4.2 Transforming Structures and Processes; 4.3 Livelihood Outcomes and Mobile Phones; 4.3.1 Financial Capital Outcomes |

4.3.2 Human Capital Outcomes  
 4.3.3 Socio-cultural Capital Outcomes;  
 4.3.4 Socio-political Capital Outcomes; 5 Conclusions; References; An Application to Support Sustainability Management in the Cuban Energy Sector; 1 Introduction; 2 Corporate Sustainability and Sustainability Management; 3 IT and Business Sustainability; 4 Methodology; 5 Building the SysPE Prototype; 5.1 Elements of the SysPE Design; 5.2 Architecture and Technologies; 6 SysPE Application Interfaces; 7 Limitations and Outlook; 8 Conclusions; References

A Framework for Environmental Management Information Systems in Higher Education  
 1 Introduction; 2 Research Objectives and Methodology; 3 Components of Environmental Management Information Systems; 4 Conclusions and Recommendations; Appendix: Guidelines for the Components of an EMIS; References; Support for Improved Scrap Tire Re-use and Recycling Decisions; 1 Introduction; 2 State of the Art; 2.1 Waste Management in the Automotive Industry; 2.2 Cascade Use of Scrap Tires as a Case Study; 2.3 Life Cycle Assessment and Material Flow Analysis; 3 Method and Concept for Cascade Use of Products

3.1 Decision Support  
 3.2 User Individual Hierarchy of Indicators; 4 Proposed Software Tool; 5 Discussion and Outlook; References; Risk Profiling for Corporate Environmental Compliance Management; 1 Introduction; 2 Related Works; 3 A Risk Management Framework for Corporate Environmental Compliance; 4 An IS-Based Risk Profiling Approach; 4.1 Risk Estimation and Risk Aggregation; 4.2 Risk Profiling IS-Service: Sample Implementation Approach; 5 Conclusions; References; Designing for Engagement: A Case Study of an ICT Solution for Citizen Complaints Management in Rural South Africa; 1 Introduction

2 Research Objectives and Methodology  
 3 Literature Review; 4 Analysing Existing Engagement Practices; 5 System Design and Development; 5.1 System Design and Tools; 5.2 System Accessibility; 6 Findings and Discussion; 6.1 User Feedback from Workshops; 7 Conclusions; References; An Analysis of the Perceived Benefits and Drawbacks of Cloud ERP Systems: A South African Study; 1 Introduction; 2 Growth and Dominance of Cloud ERP Systems; 3 Benefits and Drawbacks of Cloud ERP Systems; 4 Research Methodology; 5 Analysis of Results; 6 Conclusions and Recommendations; References

Collaborative Network Platform Solution for Monitoring, Optimization, and Reporting of Environmental and Energy Performance of...

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## Sommario/riassunto

This book presents new concepts as well as practical applications and experiences in the field of information technology for environmental engineering. The book has three main focus areas: firstly, it shows how information technologies can be employed to support natural resource management and conservation, environmental engineering, scientific simulation and integrated assessment studies. Secondly, it demonstrates the application of computing in the everyday practices of environmental engineers, natural scientists, economists and social scientists. And thirdly, it demonstrates how the complexity of natural phenomena can be approached using interdisciplinary methods, where computer science offers the infrastructure needed for environmental data collection and management, scientific simulations, decision support documentation and reporting. The book collects selected papers presented at the 7th International Symposium on Environmental Engineering, held in Port Elizabeth, South Africa in July 2015. It discusses recent success stories in eco-informatics, promising ideas and new challenges from the interdisciplinary viewpoints of computer scientists, environmental engineers, economists and social scientists, demonstrating new paradigms for problem-solving and decision-

making.

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