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Nota di bibliografia	Includes bibliographical references at the end of each chapters and index.
Nota di contenuto	Preface -- Chapter 1:Introduction (Marieka Brouwer Burg, J.H.M. Peeters, and William A. Lovis) -- Chapter 2: Is There a Research Design Role for Sensitivity Analysis (SA) in Archaeological Modeling? (William A. Lovis) -- Chapter 3: Epistemic Considerations About Uncertainty and Model Selection in Computational Archaeology: A Case Study on Exploratory Modeling (J.H.M. Peeters and Jan-Willem Romeijn) -- Chapter 4: GIS-Based Modeling of Archaeological Dynamics (GMAD): Weaknesses, Strengths, and the Utility of Sensitivity Analysis (Marieka Brouwer Burg) -- Chapter 5: Assessing Nonlinear Behaviors in an Agent Based Model (Jon W. Carroll) -- Chapter 6: Scale Dependency in Agent-Based Modeling: How Many Time Steps? How Many Simulations? How Many Agents? (Joshua Watts) -- Chapter 7: The Sensitivity of Demographic Characteristics to the Strength of the Population Stabilizing Mechanism in a Model Hunter-Gatherer System(Andrew A. White) -- Chapter 8: Archaeological Simulation and the Testing Paradigm (Thomas G. Whitley) -- Chapter 9: "Uncertainties" (Sander van der Leeuw). .
Sommario/riassunto	This volume deals with the pressing issue of uncertainty in archaeological modeling. Detecting where and when uncertainty is

introduced to the modeling process is critical, as are strategies for minimizing, reconciling, or accommodating such uncertainty. Included chapters provide unique perspectives on uncertainty in archaeological modeling, ranging in both theoretical and methodological orientation. The strengths and weaknesses of various identification and mitigation techniques are discussed, in particular sensitivity analysis. The chapters demonstrate that for archaeological modeling purposes, there is no quick fix for uncertainty; indeed, each archaeological model requires intensive consideration of uncertainty and specific applications for calibration and validation. As very few such techniques have been problematized in a systematic manner or published in the archaeological literature, this volume aims to provide guidance and direction to other modelers in the field by distilling some basic principles for model testing derived from insight gathered in the case studies presented. Additionally, model applications and their attendant uncertainties are presented from distinct spatio-temporal contexts and will appeal to a broad range of archaeological modelers. This volume will also be of interest to non-modeling archaeologists, as consideration of uncertainty when interpreting the archaeological record is also a vital concern for the development of non-formal (or implicit) models of human behavior in the past. .
