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Sommario/riassunto

Systems Biology is an approach to biology that involves understanding the complexity of interactions among biological entities within a systemic whole. The goal is to understand the emergence of physiological or functional properties. Symbolic Approaches to Modeling and Analysis of Biological Systems presents contributions of formal methods from computer science for modeling the dynamics of biological systems. It deals more specifically with symbolic methods, i. e. methods that can establish the qualitative properties of models. This book presents different approaches related to semantics, language, modeling and their link with data, and allows us to examine the

fundamental problems and challenges that biological systems are facing. The first part of the book presents works that rely on various available data to build models, while the second part gathers contributions surrounding issues of semantics and formal methods.
