

David O'Sullivan - Computing geographically: rethinking space and place in giscience



David's research and teaching interests are eclectic - he is a geographer, with an interest in novel computational methods. Common threads are fundamental concepts in spatial analysis, modeling and visualization, and the implications of geospatial technologies, computation, and especially, the complexity sciences, for how one can and should represent the world. He explores relationships between spatial structures and processes using the simulation models of complexity science. Dynamic spatial models focus attention on the neighborhood as a fundamental spatial concept. More concretely, this interest owes a great deal to his early

life- growing up in the 1970s and 80s in Belfast (Ireland), a place where local urban geographies mattered a great deal.

Sitting at the boundary between quantitative and qualitative methods, David has been intrigued by how narratives can be constructed using simulation models and has argued for narrative approaches to the analysis of models. Traditionally, biases of narrative explanations are dealt with statistical methods, but a lesson from complexity science is how local effects and individual actions scale to wider effects, strengthening the persuasiveness of narrative explanations.

Finding ways to balance narrative explanation with statistical methods is an area for further research.