

Center for Cognitive Science

University at Buffalo, State University of New York

Wednesday, November 12, 2003

280 Park Hall
North Campus
2:00 pm –4:00 pm

Maureen Donnelly, Ph.D.
Institute for Formal Ontology and Medical Information Science,
University of Leipzig, Germany
Department of Philosophy
University at Buffalo

A Layered Theory of Places

In his Scholium to the Principia, Newton distinguishes between absolute places and relative places. He points out that in ordinary spatial reasoning, we use relative places, not absolute places, to locate objects and track their movements. A relative place is any location, such as the interior of a ship, whose boundaries are determined by its standing in a fixed spatial relation to some material object. Taken together, the collection of all relative places is a jumble of locations that may move through or around one another. The purpose of this talk is to present a method for infusing order into this mess by partitioning the set of all relative places into separate collections, called "layers", in such a way that all members of a single layer stand in a fixed relation to one another. This approach is presented as a formal theory (in standard first-order predicate calculus) intended to support reasoning about and representation of places.

Refreshments will be available
Everyone is welcome!

For information please call the Cognitive Science Office at (716) 645-3794 or check
<http://www.cogsci.buffalo.edu/Activities/Colloquium/CLLOf03/2003fall.htm>

Sponsored by the Office of the Vice President for Research, University at Buffalo, The State University of New York