

Donna J. Peuquet

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Education

State University of New York at Buffalo	Geography	B.A. 1968
University of Cincinnati	Geography	M.A. 1971
State University of New York at Buffalo	Geography	Ph.D. 1977

Appointments

- Professor, The Pennsylvania State University, 7/1995 - present
- Associate Professor, The Pennsylvania State University, 1/1986 - 6/1995
- Research Assistant Professor, University of California at Santa Barbara, 7/1982 - 12/1985
- Geographer, Earth Resources Observation Systems Office, U. S. Geological Survey (Reston, Virginia), 10/1979 - 6/1982
- Research Assistant Professor, Department of Geography, State University of New York at Buffalo, 9/1979 - 10/1979
- Clinical Assistant Professor, Department of Geography, State University of New York at Buffalo, 9/1978 - 8/1979
- Department of Geography, State University of New York at Buffalo, Clinical Lecturer 9/1976 - 8/1978
- International Geographical Union, Commission on Geographical Data Sensing and Processing, Research Associate, 1/1976 - 8/1976
- Department of Planning and Development, City of Niagara Falls, NY, Senior Planner, 2/1971 - 9/1974

Selected Publications

- Weaver, C., David Fyfe, Anthony Robinson, Deryck Holdsworth, Donna Peuquet and Alan M. MacEachren, "Visual Analysis of Historic Hotel Visitation Patterns," *Information Visualization* (Special Issue on Visual Analytics), 5(1): [in press].
- Peuquet, D. J. (with others), "Data Representation and Transformation," Chap. 4, pp. 105-136 in *Illuminating the Path: The Research and Development Agenda for Visual Analytics*, J. Thomas and K. Cook (eds.) produced by the National Visualization and Analytics Center, Los Alamitos, CA: IEEE Computer Society Press (2005)
- Peuquet, D.J. (Ed.), (2005) International Society for Photogrammetry and Remote Sensing Journal, special section on Advances in Spatio-Temporal Analysis and Representation, 60(1).
- Jianwei Dou and Donna J. Peuquet (2005) Flexible Indexing of Spatiotemporal Information with Multiple Views, *Geocomputation '05*, Ann Arbor, MI. August 1-3.
- Yuan, M., D. Mark, M. Egenhofer, D. Peuquet (2004). Extensions to Geographic Representations. *Research Challenges in Geographic Information Science*. R. McMaster and L. Uery, Eds. CRC Press, Boca Raton, FL, pp. 129-156.
- Mennis, J. and D. Peuquet (2003). "The role of knowledge representation in geographic knowledge discovery: A case study." *Transactions on GIS* 7(3): 371-91.
- Guo, D., D. Peuquet and M. Gahegan (2003). "Iceage: Interactive clustering and exploration of large and high-dimensional geodata." *Geoinformatica* 7(3): 229-53.

- Peuquet, D. J. (2002). *Representations of space and time*. New York, Guilford.
- Peuquet, D. J. and M.-J. Kraak (2002). "Geobrowsing: Creative thinking & knowledge discovery using geographic visualization." *Information Visualization* 1(1): 80-91.
- Peuquet, Donna J. (2001) "Making space for time: Issues in space-time data representation," *GeoInformatica*, 5(1): 11-32.
- Mennis, Jeremy, and Donna Peuquet (2000) "A conceptual framework for incorporating cognitive principles into Geographic Information Systems," *International Journal of Geographical Information Systems*, Vol. 14, No. 6, pp. 501-520.

Synergistic Activities

Awarded a John Simon Guggenheim Memorial Foundation Fellowship for July 2000-June 2001. The title of her fellowship project was; "A Cognitive Approach to Representing Geographic Knowledge." Key components of this project included cognitively-informed database and visual representation of geographic knowledge, and how this can be used for creative thinking, knowledge discovery, and analysis of large geographic databases.

Co-PI (with Alan MacEachren) of a funded project within the GeoVista Center at Penn State developing a prototype, called STNexus, that integrates state-of-the-art Geo-Visualization technology with state-of-the-art space-time database capability.

Currently a member of the Editorial Board of the International Journal of Geographical Information Systems, Taylor & Francis, and International Society for Photogrammetry and Remote Sensing (ISPRS) Journal of Photogrammetry and Remote Sensing, Elsevier.

Lead voting Penn State representative to the University Consortium for Geographic Information Sciences (UCGIS) since participating in the formation of this organization and has served as a member of the Board of Directors (1996-1998 and 2007-present).

Co-organizer (with Dr. Barry Smith, Philosophy, SUNY Buffalo) of an interdisciplinary workshop on The Ontology of Fields, sponsored by the National Consortium for Geographic Information and Analysis, held in Bar Harbor, Maine, June, 1998.

Collaborators & Other Affiliations

Collaborators -

Alan MacEachren, Mark Gahegan, Christopher Weaver, Deryck Holdsworth, David Fyfe, Anthony Robinson, Wang-Chien Lee, Duanping Liao, Yinkang Duan and Hung-Mo Lin, Penn State University; Diansheng Guo, University of South Carolina; Eric Whitsel, Richard Smith, Gerardo Heiss, and Jiu-Chiuan Chen, University of North Carolina; Menno-Jan Kraak, International Institute for Aerospace Survey and Earth Science (ITC) (The Netherlands),

Graduate Advisees (Total advisees: approx 26) -

John Kelmelis, U.S. Department of State; Elizabeth Wentz, Arizona State University; Jeremy Mennis, Temple University; Diansheng Guo, University of South Carolina; Chaoqing Yu, University of Maryland; Ryan Baxter, Penn State University; Ralph Heidl, University of Washington; Lee Ann Nolan, Jianwei Dou, Ritesh Agrawal, Kean Huat Soon - Penn State University

Postgraduate Scholars (Total sponsored: 2) -

Monica Wachowicz, Christopher Weaver