

Geospatial Semantics and Ontology – Publications

2016

- Varanka, D.E. and Cheatham, M. 2016. Spatial Concepts for Hydrography Ontology Alignment. Proceedings of AutoCarto 2016.

2015

- Lieberman, J., Cheatham, M., and Varanka, D.E. 2015. Applicability of Alignment Methodologies to Spatial Ontologies in the Hydro Domain [poster]. American Geophysical Union (AGU).
- Varanka, D.E. and Usery, E.L. [An Applied Ontology for Semantics Associated with Surface Water Features](#). 2015. In Karl Ahlqvist, Dalia E. Varanka, Steffen Fritz, and Krzysztof Janowicz, Eds., Land Use and Land Cover Semantics: Principles, Best Practices, and Prospects. Boca Raton, Florida, CRC Press.
- Varanka, D.E., Usery, E.L., and Mattli, D.D. [Adapting the U.S. National Hydrography Dataset to Linked Open Data](#). 2015. In Claudia Robbi Sluter, Carla Bernadete Madureira Cruz, and Paulo Márcio Leal de Menezes, Eds. Cartography – Maps Connecting the World. Lecture Notes in Geoinformation and Cartography, Springer. pp. 129 – 146.

2013

Varanka, D. and Caro, H., 2013, [Spatial Relation Predicates for Topographic Data Triples](#). In Martin Raubal, Andrew Frank, and David Mark, Eds., Cognitive and Linguistic Aspects of Geographical Space, New Perspectives on Geographic Information Research. Lecture Notes in Geoinformation and Cartography Springer. p. 175-193.

2012

- Varanka, D.E., 2012, [Introduction to Geospatial Semantics and Technology Workshop Handbook: U.S. Geological Survey Open-File Report 2012-1109](#), 107 p.

Varanka, D.E. and Usery, E.L., 2012, Topographic Feature Type Vocabularies for Ontology Design Patterns. IEEE International Geoscience and Remote Sensing Symposium (IGARSS), July 2012.

2011

- Wiegand, N., Berg-Cross, G., and Varanka, D.E., eds., 2011, Spatial Semantics and Ontologies Workshop Proceedings, ACM SIGSPATIAL Chicago, Nov. 1-5, 2011
- Usery, E.L. and Varanka, D.E., 2011, Design and Development of Linked Data for The National Map. The Semantic Web Journal. <http://www.semantic-web-journal.net/content/design-and-development-linked-data-national-map>.

2010

- Varanka, D., 2010, Ontology, in Warf, B., ed., Encyclopedia of Geography: Thousand Oaks, California, Sage Publications, Inc.
- Varanka, D. and Jerris, T., 2010, [Ontology Design Patterns for Complex Topographic Features](#). AutoCarto 2010, Orlando FL, Nov.
- Varanka, D. and Usery, E.L., 2010, [Special Section: Ontological Issues for The National Map: Cartographica](#): The International Journal for Geographic Information and Visualization, v. 45, n. 2, p. 103-104.

2009

- Varanka, D., 2009, [A Topographic Feature Taxonomy For A U.S. National Topographic Mapping Ontology](#), International Cartography Conference, Santiago, Chile, November, 2009.
- Varanka, D., 2009, [Landscape Features, Technology Codes, and Semantics in U.S. National Topographic Mapping Databases](#): The International Conference on Advanced Geographic Information Systems & Web Services (GEOWS), Cancun, Mexico, February 1-7, 2009.
- Wei, M., 2009, [Enabling semantic power of geographic data](#), position paper to Ontology for *The National Map* Workshop, Feb. 3-4, 2009.

2008

- Varanka, D., 2008, [National Topographic Modeling, Ontology-Driven Geographic Information in the Context of *The National Map*](#): First International Workshop on Information Semantics and its Implications for Geographical Analysis (ISGA '08) at GIScience 2008, the 5th International Conference on Geographic Information Science, Park City, Utah, September 23, 2008.

- Wei, M., Zhao, T., Varanka, D., and Usery, E.L., 2008, [A conceptual design towards semantic geospatial data access](#): poster presented at the 5th International Conference on Geographic Information Science.
- Zhao, T., Zhang, C., Wei, M., and Peng, Z., 2008, [Ontology-based geospatial data query and integration](#): 5th International Conference on Geographic Information Science, September 23-26, Park City, Utah.