

Class 1: Introduction to e-Science and Semantic Web August 30, 2010  
Assignment 0: CSCI-6962-01-2010 (5% of overall credit score)  
Due: September 13, 2010 (by 1200 EST)  
Submission method: email to [d1m@cs.rpi.edu](mailto:d1m@cs.rpi.edu), [jluciano@cs.rpi.edu](mailto:jluciano@cs.rpi.edu)  
Late submission policy: First time with valid reason -no penalty, otherwise 20% of score deducted each late day.  
Naming scheme: CSCI2010-6962\_Assignment0\_YOUR\_NAME.ext

#### Readings:

Ontologies 101, Semantic Web, e-Science, RDFS, OWL Guide, NYT Article.

Assignment 0: Turn in a ONE PAGE description of the reading you liked best, two main points, and why you thought the points were interesting and useful.

Note: We will begin the next class by having everyone present one of the points they found interesting.

#### Class 1 Reading Assignment:

1. Ontologies 101 Natalya F. Noy and Deborah L. McGuinness. Ontology Development 101: A Guide to Creating Your First Ontology. Stanford Knowledge Systems Laboratory Technical Report KSL-01-05 and Stanford Medical Informatics Technical Report SMI-2001-0880, March 2001. <http://ksl.stanford.edu/people/d1m/papers/ontology-tutorial-noy-mcguinness-abstract.html>
2. "Sharing of Data Leads to Progress on Alzheimer's," By GINA KOLATA, New York Times, August 12, 2010 [http://www.nytimes.com/2010/08/13/health/research/13alzheimer.html?\\_r=1](http://www.nytimes.com/2010/08/13/health/research/13alzheimer.html?_r=1)
3. Semantic Web: T Berners-Lee, J Hendler, O Lassila. The Semantic Web. Scientific American, 2001. <http://www.sciam.com/article.cfm?id=the-semantic-web>. Alternative link <http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.115.9584&rep=rep1&type=pdf>.
4. Semantic Web Primer: Grigoris Antoniou and Frank van Harmelen <http://www.ics.forth.gr/isl/swprimer/>.
5. e-Science: Hey, T., and Trefethen, A. Cyberinfrastructure for e-Science. Science 308, 5723 (2005), 817-821 <http://www.sciencemag.org/cgi/reprint/308/5723/817.pdf>
6. RDFS: RDF Vocabulary Description Language 1.0: RDF Schema. World Wide Web Consortium (W3C) Recommendation. February 10, 2004 <http://www.w3.org/TR/rdf-schema/>.
7. OWL Web Ontology Language Guide <http://www.w3.org/TR/owl-guide/>, Michael K. Smith, Chris Welty, and Deborah L. McGuinness. World Wide Web Consortium (W3C) Recommendation. February 10, 2004.

#### Optional

1. World Wide Web Consortium (W3C) Recommendation. October 27, 2009 <http://www.w3.org/TR/owl2-overview/>.
2. Common Logic: John Sowa, Common Logic Controlled English, March, 2007 [www.jfsowa.com/clce/clce07.htm](http://www.jfsowa.com/clce/clce07.htm). (The previous link is an updated Section 7 of <http://www.jfsowa.com/clce/specs.htm> Common Logic Controlled English (the full) Common Logic Controlled English draft.