# SEMANTIC WEB BASED APPLICATION FOR KNOWLEDGE MANAGEMENT IN BUSINESS FLOWS

phd. Candidate Andreea DIOŞTEANU, prof.univ.dr. Ion SMEUREANU
Economic Informatics Department,
Academy of Economic Studies, Bucharest, Romania
andreea.diosteanu@ie.ase.ro, smeurean@ase.ro

**Abstract:** This article presents the architecture of a framework designed to facilitate the interoperability between organizations based on knowledge management. The framework has four components: business flow design, rules developing, semantic networks and ontologies design, automated semantic web service composition. The latter, is based on fractals theory and agent supervision so that to determine the boundaries of the research environment and to enhance composition performance.

**Keywords:** semantic web, business, knowledge, interoperability, services, fractals

## References

[1] Information Society Technologies-"Enterprise Interoperability Research Roadmap Final Version," 31 July 2006 ftp://ftp.cordis.europa.eu/pub/ist/docs/directorate_d/ebusiness/ei-roadmap-final_en.pdf
[2] H. Dragomirescu (2001) „Organizaţii bazate pe cunoaştere," Research Institute for Artificial Intelligence, Available: http://www.racai.ro/INFOSOCProject/Dragomirescu_st_g06_new.pdf
[3] I.Smeureanu and A.Dioşteanu, „A Collaborative System Software Solution for Modeling Business Flows Based on Automated Semantic Web Service Composition", Informatică Economică Journal,vol. 13, no 1, pp 32-40, 2009
[4] S.Kalasapur, "Dynamic Service Composition in Pervasive Computing", IEEE Transactions on Parallel and Distributed Systems, Vol. 18(7) pp 907-918, 2007
[5] P. Bartalos, "Enhancing Semantic Web Services Composition with User Interaction," IEEE International Conference on Services Computing, 2008, pp 503-506
[6] J. Kim and Y. Gil, "Towards interactive composition of semantic web services. In Semantic Web Services", AAAI Spring Symposium, 2004.
[7] C.Bussler, „The Fractal Nature of Web Services",Computer, Vol.40, Issue 3, pp 93-95, March 2007