Requirements Engineering in Open Systems — REOS'03

In conjunction with the 11th IEEE Intl. Requirements Engineering Conference

September 8, 2003, Monterey Bay, California, USA

Full Information: http://www.cs.uoregon.edu/∼ fickas/REOS/

Call for Papers

Workshop Co-Chairs

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Integration and interoperation have become the critical issues in engineering multi-stakeholder distributed systems (MSDS) like the Internet electronic mail system, networks of web services, modern telephone networks, and the Internet itself. Consistent, well defined protocols and other low level requirements enable these systems to function, but higher level requirements placed by diverse users are often ephemeral and typically inconsistent when viewed together. Thus, for the field of requirements engineering to deal with open MSDSs at all, we need to shift our thinking from systems having consistent, global requirements to those in which requirements can be user-relative and ephemeral.

Beyond that issue, however, lurks a second major challenge dubbed the "ignorance problem": since the nodes of an MSDS are controlled by stakeholders with different goals, priorities, and capabilities, just knowing what they all do is a challenge. For example, email features and functionality have grown so complex that merely knowing a host serves TCP port 25 (SMTP) does not give enough information to know whether one's email message will be handled correctly. Current web services provide the means to discover method signatures; however, formal service standards have yet to be defined. The ignorance problem makes requirements validation even more difficult than it is in traditional software engineering settings, adding lack of information to the usual formalization and computational complexity issues.

Workshop Goals. This workshop is intended to bring together researchers and practitioners in requirements engineering, component-based design (including Enterprise Application Integration (EAI)), verification and validation, and related fields to discuss the challenges of designing and using open systems in which requirements are ephemeral and user-relative, and in which it is difficult or impossible to know the behaviors of all the parts of the system. Our goals for the workshop are (1) to improve awareness and understanding of how open systems create novel problems for requirements engineering, and (2) begin to explore potential solutions. To help focus the discussion, we have selected some open system scenarios (see full call for participation) and encourage each presentation to discuss how its ideas address or relate to the problems illustrated in the scenarios. The format of the presentations will include extra time for audience discussion of each presentation, hopefully allowing the group both to better understand each set of ideas and to relate them to other presentations and to the workshop themes.

Submission Information: A minimum 2 page position paper should be submitted in PDF format via email to the co-chairs. Papers will be reviewed by the program committee for relevance to the workshop theme. For workshop presentation choices, the committee will give preference to papers that address one or more of the example scenarios (or closely related) given in the full workshop description on the workshop web page.

Important Dates:
> Submissions Due: June 27, 2003
> Notification to Authors: July 18, 2003
> Camera-ready copy due: August 4, 2003
> Workshop Date: September 8, 2003

Program Committee

Annie Anton, North Carolina State U.

Stephen Fickas, U. Oregon, **Co-Chair**

Carlo Ghezzi, Politecnico di Milano

Robert J. Hall, AT&T Labs Research, **Co-Chair**

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