# Journal of Internet Services and Applications

Thematic Series on "Complex Distributed Systems and Systems of Systems"

## CALL FOR PAPERS

https://etriviere.github.io/jisa-systems-of-systems/

Submissions accepted until January 31st 2017



## **MOTIVATION**

Recent years have witnessed a proliferation of end user and machine-to-machine (M2M) applications. This trend has been facilitated by a rapid increase in number and capacity of pervasive devices such as smart phones, tablets, smart meters, etc. It also benefited from the ease of access to computing resources allowed by cloud computing. This has created a wealth of complex distributed systems that interconnect to exchange data, share processing, access control functionalities and offer advanced cyber-physical services to end users.

Such systems are often designed with a predetermined deployment environment. However, post-deployment environments seldom remain unchanged and systems come in contact of each other in ways that were not necessarily envisioned a priori. As such, there is a need for any distributed system to develop means of adapting accordingly by forming mutualistic relationships with other systems, forming a more complex system of systems.

This JISA Thematic Series provides a forum for describing innovative contributions to the conceptual and architectural design, implementation, deployment, and evaluation of distributed systems with the aim of facilitating complex systems of systems. The series presents novel research efforts and approaches in discovering and actuating opportunistic relationships between systems of different sorts such as big data systems, Internet of Things (IoT) systems, cyber-physical systems, M2M business applications, network overlays, and multimedia delivery systems.

### **TOPICS OF INTEREST**

Topics include, but are not limited to the following:

- Design architectures for enabling the creation of systems of systems
- Programming abstractions and tools to support building systems of systems
- Symbiosis of non-integrated systems
- A posteriori identification of opportunistic relationships
- Formal description and classification of the ecology of systems of systems
- Forging impromptu agreements between systems
- Security and privacy concerns relating to reactive building of systems of systems
- Assessment of the trade offs involved: economic, performance, energy efficiency, reliability, scalability, etc.
- Applicability of systems of systems programming in different scenarios
- Resource discovery and sharing in evolving systems such as wearable, PAN, and home automation systems

#### SUBMISSION INSTRUCTIONS

Manuscripts are submitted online as per instructions at http://www.jisajournal.com/manuscript. JISA is an international Open Access journal from SpringerOpen.

Before submitting your manuscript, please ensure you have carefully read the Instructions for Authors for Journal of Internet Services and Applications. The complete manuscript should be submitted through the Journal of Internet Services and Applications submission system at <a href="http://www.jisajournal.com/manuscript">http://www.jisajournal.com/manuscript</a>. To ensure that you submit to the correct thematic series please select the appropriate section in the drop-down menu upon submission. All submissions will undergo rigorous peer review and accepted articles will be published within the journal as a collection.

Submissions should seek an appropriate balance between content and length. In all cases, submissions to the special issue should not exceed 20 pages of text in length, excluding references.

Submissions will also benefit from the usual advantages of open access publication:

- **Rapid publication**: Online submission, electronic peer review and production make the process of publishing your article simple and efficient
- **High visibility** and international readership in your field: Open access publication ensures high visibility and maximum exposure for your work anyone with online access can read your article
- Publishing online means extended space for figures, data and video footage.
- Authors **retain copyright**, licensing the article under a Creative Commons license: articles can be freely redistributed and reused as long as the article is correctly attributed

It is the wish of the JISA team that all quality articles will be published in the journal independent of the funding capacity of the authors. Thus, if the authors are unable to pay the APC charge, we request that they contact the lead guest editors and ask for a waiver.

For editorial enquiries please contact editorial@jisajournal.com

#### SUBMISSION SCHEDULE

Submissions will be processed as soon as they are submitted. Publication of the thematic series will be done on a single-paper basis, allowing early submissions accepted for publication to be published earlier.

- Submissions accepted until: January 31, 2016
- First response from reviewers: 2 months from submission
- Publication: end 2017, or earlier for early submissions

#### **Questions?**

If you have any questions about the suitability of your manuscript or any other query related to this call do not hesitate to contact the theme editors at jisa.sos.ts.editors@gmail.com.

#### THEMATIC SERIES EDITORS

- Yehia Elkhatib, Lancaster University, United Kingdom
- · Laurent Réveillère, Bordeaux INP, France
- Etienne Rivière, Université de Neuchâtel, Switzerland