



SOSP '14

**Symposium on Software Performance:
Joint Descartes/Kieker/Palladio Days 2014**

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Proceedings

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Preface

Performance is one of the most relevant quality attributes of any IT system. While good performance leads to high user satisfaction, poor performance lead to loss of users, perceivable unavailability of the system, or unnecessarily high costs of network or compute resources. Therefore, various techniques to evaluate, control, and improve the performance of IT systems have been developed, ranging from online monitoring and benchmarking to modeling and prediction. Experience shows, that for system design or later optimization, such techniques need to be applied in smart combination.

Therefore, the Symposium on Software Performance brings together researchers and practitioners interested in all facets of software performance, ranging from modeling and prediction to monitoring and runtime management. The symposium is organized by three already established research groups, namely Descartes, Kieker, and Palladio, who use this symposium also as a joint developer and community meeting. Descartes' focus are techniques and tools for engineering self-aware computing systems designed for maximum dependability and efficiency. Kieker is a well-established tool and approach for monitoring software performance of complex, large, and distributed IT systems. Palladio is a likewise-established tool and approach for modeling software architectures of IT systems and for simulating their performance.

The two-and-a-half day program features developer meetings, 19 talks (including two invited industrial talks), seven tutorials, and a dedicated poster session with almost ten posters. In the first industrial talk, Heiko Koziolk (ABB Corporate Research) reports about six years of Performance Modeling at ABB Corporate Research. In the second industrial talk, Stefan Fütterling and Michael Großmann (Capgemini) report about performance challenges in a large mainframe system.

In addition to invited contributions from practitioners and researchers, we welcomed contributions from academic, scientific, or industrial contexts in the field of software performance, including but not limited to approaches employing Descartes, Kieker, and/or Palladio. We solicited the following types of contributions: presentation, tool demonstration/tutorial, poster. Submitted proposals were evaluated based on a submission form, asking for the proposed contribution's list of authors, title, type, summary, relation to Descartes/Kieker/Palladio, as well as a list of previous events/publications where the work has been presented before. Authors of accepted contributions have had the opportunity to submit a paper to be published in this symposium proceedings. This proceedings volume includes the abstracts of all accepted contributions as well as 13 papers, describing a subset of the contributions in more detail.

We would like to thank all participants that contribute to the event, including the authors and presenters, as well as the NovaTec GmbH who sponsors this event by hosting and catering.

November 2014

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André van Hoorn, Samuel Kounev, Ralf Reussner

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