

Johannes Manner
Stephan Haarmann
Stefan Kolb
Nico Herzberg
Oliver Kopp

ZEUS 2021

13th ZEUS Workshop, ZEUS 2021,
Bamberg, Germany, 25–26 February 2021
Proceedings

Volume Editors

Johannes Manner
University of Bamberg, Distributed Systems Group
An der Weberei 5, DE-96049 Bamberg
johannes.manner@uni-bamberg.de

Stephan Haarmann
Hasso Plattner Institute, Business Process Technology
Prof.-Dr.-Helmert-Str. 2-3, DE-14482 Potsdam
stephan.haarmann@hpi.de

Stefan Kolb
JabRef Research
stefan.kolb@jabref.org

Nico Herzberg
Campeleon GmbH
Gostritzer Str. 61, 01217 Dresden

Oliver Kopp
JabRef Research
oliver.kopp@jabref.org

*Copyright ©2021 for the individual papers by the papers' authors.
Copyright ©2021 for the volume as a collection by its editors.
This volume and its papers are published under the Creative Commons License
Attribution 4.0 International (CC BY 4.0).*

Preface

In February 2021, we had the pleasure to organize the 13th edition of the ZEUS Workshop planned in Bamberg, Germany. Due to the ongoing covid-19 pandemic, the workshop was held virtually, giving us the chance to also invite our PC members which are one of ZEUS' success factors. Thanks a lot for your reviewing work and the ongoing support.

This workshop series offers young researchers an opportunity to present and discuss early ideas and work in progress as well as to establish contacts among young researchers. For this year's edition, we selected all thirteen submissions for presentation at the workshop. Each submission went through a thorough peer-review process and was assessed by at least five members of the program committee with regard to its relevance and scientific quality. The accepted contributions cover the areas of Business Process Management, Cloud Computing, Microservices, Software Design, and the Internet of Things.

The workshop program was further enriched by keynotes from both academia and the industry. Niall Deehan from Camunda Services GmbH gave a talk about the functionality of Camunda Modeler to *Closing the IT-Business Gap*. Dr. Daniel Lübke, Digital Solutions Architecture, presented his research on *BPMN Method & Style dissected* and encouraged all researches to conduct empirical research to understand practical concerns to address them in further research. The best presentation award was given to Sebastian Böhm from the University of Bamberg for his presentation on *Profiling Lightweight Container Platforms: MicroK8s and K3s in Comparison to Kubernetes*.

The workshop was generously sponsored by Camunda Services GmbH.

Bamberg, February 2021

Johannes Manner
Stephan Haarmann
Stefan Kolb
Nico Herzberg
Oliver Kopp

Organization

Steering Committee

Nico Herzberg	Campeleon GmbH
Oliver Kopp	JabRef Research
Stefan Kolb	JabRef Research
Stephan Haarmann	Hasso Plattner Institute, University of Potsdam
Johannes Manner	University of Bamberg

Local Organizer

Robin Lichtenthaler	University of Bamberg
Sebastian Bohm	University of Bamberg

Program Committee Chairs

Stephan Haarmann	Hasso Plattner Institute, University of Potsdam
Johannes Manner	University of Bamberg

Program Committee

Saimir Bala	Vienna University of Economics and Business
Achim D. Bruckner	University of Exeter
Sebastian Böhm	University of Bamberg
Dirk Fahland	Eindhoven University of Technology
Manuel Fritz	University of Stuttgart
Matthias Geiger	University of Bamberg
Georg Grossmann	University of South Australia
Lukas Harzenetter	University of Stuttgart
Thomas Heinze	German Aerospace Center
Pascal Hirmer	University of Stuttgart
Christoph Hochreiner	Compass Verlag
Meiko Jensen	Kiel University of Applied Sciences
Jan Ladleif	Hasso Plattner Institute, University of Potsdam
Jörg Lenhard	SAP SE
Robin Lichtenthäler	University of Bamberg
Daniel Lübke	Digital Solution Architecture
Matteo Nardelli	University of Rome Tor Vergata
Adriatik Nika	Hasso Plattner Institute, University of Potsdam
Stefan Schulte	Vienna University of Technology
Jan Sürmeli	FZI Forschungszentrum Informatik, Karlsruhe
Stefan Winzinger	University of Bamberg
Michael Wurster	University of Stuttgart
Han van der Aa	Humboldt University of Berlin

Sponsoring Institutions

Camunda Services GmbH

Table of Contents

Fragment-Based Case Management Models: Metamodel, Consistency, & Correctness	1
<i>Stephan Haarmann</i>	
Towards Decision Management for Robotic Process Automation	9
<i>Simon Siegert and Maximilian Völker</i>	
Towards Real-Time Progress Determination of Object-Aware Business Processes	14
<i>Lisa Arnold, Marius Breitmayer and Manfred Reichert</i>	
Towards a Framework for Data Enhanced Process Models in Process Mining	19
<i>Jonas Cremerius</i>	
Detecting Semantic Business Process Model Clones	25
<i>Thomas Heinze, Wolfram Amme and André Schäfer</i>	
A Dashboard-based Approach for Monitoring Object-Aware Processes ...	29
<i>Marius Breitmayer, Lisa Arnold and Manfred Reichert</i>	
Custom-MADE – Leveraging Agile Rationale Management by Employing Domain-Specific Languages	34
<i>Mathias Schubanz</i>	
ElogQP: An Event log Quality Pointer	42
<i>Tobias Ziolkowski, Lennart Brandt and Agnes Koschmider</i>	
Analysis of Prevalent BPMN Layout Choices on GitHub	46
<i>Daniel Lübke and Daniel Wutke</i>	
A Deep Q-learning Scaling Policy for Elastic Application Deployment ...	55
<i>Fabiana Rossi</i>	
Profiling Lightweight Container Platforms: MicroK8s and K3s in Comparison to Kubernetes	65
<i>Sebastian Böhm and Guido Wirtz</i>	
An Evaluation of Saga Pattern Implementation Technologies	74
<i>Karolin Dürr, Robin Lichtenthaler and Guido Wirtz</i>	
Systematic Literature Tools: Are we there yet?	83
<i>Dominik Voigt, Oliver Kopp and Karoline Wild</i>	
Author Index	89