

BMSD'18 Technical Program

July 2	July 3	July 4
	08:30 Welcome Desk Registration	
	09:00 Keynote Lecture Prof. Roy Oberhauser <i>Chair: Prof. Dr. Marijn Janssen</i>	09:00 Welcome Desk Registration
	10:00 BMSD'18 Session 4: Full Papers blockchain technology	09:30 BMSD'18 Session 11: Short Papers data analytics and open data
	11:00 Coffee-Break	10:30 BMSD'18 Session 12: Short Papers models and notations
	11:10 BMSD'18 Session 5 context-awareness & value-sensitive design	11:10 Coffee-Break
	12:15 BMSD'18 Session 6: Full Papers IoT and method engineering	11:25 BMSD'18 Session 13: Short Papers rule adherence and digitization - impact on business models and relevance to inter-enterprise collaborations
	12:45 Lunch	12:45 Lunch
13:30 Welcome Desk Registration	13:45 BMSD'18 Session 7: Full Papers BP modeling, visualization, virtual reality	13:45 BMSD'18 Session 14: Short Papers business-IT alignment, ontology-based modeling, and supply-chain applications
14:00 Opening Session	14:45 BMSD'18 Session 8: Full Papers data analytics	14:45 BMSD'18 Session 15: Short Papers IT architectures and software ecosystems
14:15 Panel <i>Chair: Dr. Boris Shishkov</i>	15:15 Coffee Break	15:45 Coffee-Break
15:15 Coffee-Break	15:40 BMSD'18 Session 9: Full Papers IoT and information security	16:00 BMSD'18 Session 16: Short Papers software development and IoT applications
15:30 Keynote Lecture Prof. Dr. Jan Mendling <i>Chair: Prof. Roy Oberhauser</i>	16:10 BMSD'18 Session 10: Full Papers models and notations	17:00 Discussion & Closing Session
16:30 BMSD'18 Session 1: Full Papers enterprises, contracting, design		
17:30 BMSD'18 Session 2: Full Papers strategies' realization & BP management	18:15 Meeting Point: U2 Messe / Prater	
18:00 BMSD'18 Session 3: Full Papers variability management	Walking Tour	
	20:00 Symposium Dinner	
	22:00	

The list of ACCEPTED PAPERS follows on the next three pages

BMSD'18: List of Accepted Papers

Session 1: **ENTERPRISES, CONTRACTING, DESIGN**

Paper 1:

Business, Contracts, Information

Presenter: **Coen Suurmond**

Author: Coen Suurmond

Paper 2:

Reconciling the Academic and Enterprise Perspectives of Design Thinking

Presenter: **José Carlos Camposano**

Author: José Carlos Camposano

Session 2: **STRATEGIES' REALIZATION & BP MANAGEMENT**

Paper 3:

From Strategy to Process Improvement Portfolios and Value Realization: A Digital Approach To the Discipline of Business Process Management

Presenter: **Mathias Kirchmer**

Authors: Mathias Kirchmer, Peter Franz, Rakesh Gusain

Session 3: **VARIABILITY MANAGEMENT**

Paper 13:

Increasing the Visibility of Requirements Based on Combined Variability Management

Presenter: **Andreas Sinnhofer**

Authors: Andreas Sinnhofer, Felix Oppermann, Klaus Potzmader, Clemens Orthacker, Christian Steger, Christian Kreiner

Session 4: **BLOCKCHAIN TECHNOLOGY**

Paper 4:

Blockchain-based Traceability of Inter-organisational Business Processes

Presenter: **Claudio Di Ciccio**

Authors: Claudio Di Ciccio, Alessio Cecconi, Jan Mendling, Dominik Felix, Dominik Haas, Daniel Lilek, Florian Riel, Andreas Rumpl, Philipp Uhlig

Paper 5:

A Blockchain Architecture for Reducing the Bullwhip Effect

Presenter: **Sélinde van Engelenburg**

Authors: Sélinde van Engelenburg, Marijn Janssen, Bram Klievink

Session 5: **CONTEXT-AWARENESS & VALUE-SENSITIVE DESIGN**

Paper 12:

Three Categories of Context-Aware Systems

Presenters: **Boris Shishkov & Marijn Janssen**

Authors: Boris Shishkov, John Bruntse Larsen, Martijn Warnier, Marijn Janssen

Paper 31:

Business Process Variability and Public Values

Presenters: **Boris Shishkov & Jan Mendling**

Authors: Boris Shishkov and Jan Mendling

Paper 32:

Composite Public Values and Software Specifications

Presenters: **Boris Shishkov & Marijn Janssen**

Authors: Magdalena Garvanova, Boris Shishkov, Marijn Janssen

Session 6: **IoT AND METHOD ENGINEERING**

Paper 14:

Situational Method Engineering for Constructing Internet of Things Development Methods

Presenter: **Ayalew Kassahun**

Authors: Gökem Giray and Bedir Tekinerdogan

Session 7: **BP MODELING, VISUALIZATION, VIRTUAL REALITY**

Paper 6:

VR-BPMN: Visualizing BPMN Models in Virtual Reality

Presenter: **Roy Oberhauser**

Authors: Roy Oberhauser, Camil Pogolski, Alexandre Matic

Paper 7:

Process Modeling within Augmented Reality, The Bidirectional Interplay of Two Worlds

Presenter: **Norbert Gronau**

Authors: Marcus Grum, Norbert Gronau

Session 8: **DATA ANALYTICS**

Paper 8:

Efficient Aggregation Methods for Probabilistic Data Streams

Presenter: **Maksim Goman**

Author: Maksim Goman

BMSD'18: List of Accepted Papers (Cont.)

Session 9: **IoT AND INFORMATION SECURITY**

Paper 11:

An Information Security Architecture for Smart Cities

Presenter: **Prince Singh**

Authors: A.R.R. Berkel, Prince M. Singh, Marten van Sinderen

Session 10: **MODELS AND NOTATIONS**

Paper 9:

A Method for Operationalizing Service-Dominant Business Models into Conceptual Process Models

Presenter: **Bambang Suratno**

Authors: Bambang Suratno, Baris Ozkan, Oktay Turetken, Paul Grefen

Paper 10:

Interoperability of BPMN and MAML for Model-Driven Development of Business Apps

Presenter: **Christoph Rieger**

Author: Christoph Rieger

Session 11: **DATA ANALYTICS AND OPEN DATA**

Paper 19:

General Architectural Framework for Business Visual Analytics

Presenter: **Yavor Dankov**

Authors: Yavor Dankov and Dimitar Birov

Paper 20:

A Causal Explanatory Model of Bayesian-belief Networks for Analysing the Risks of Opening Data

Presenter: **Ahmad Luthfi**

Authors: Ahmad Luthfi, Marijn Janssen, Joep Crompvoets

Paper 21:

Presence Patterns and Privacy Analysis

Presenter: **Ella Roubtsova**

Authors: Ella Roubtsova, Serguei Roubtsov, Greg Alpar

Session 12: **MODELS AND NOTATIONS**

Paper 17:

Towards the Component-based Approach for Evaluating Process Diagram Complexity

Presenter: **Jernej Huber**

Authors: Jernej Huber, Gregor Polančič, Mateja Kocbek, Gregor Jošt

Paper 18:

Differences Between BPM and ACM Models for Process Execution

Presenter: **Alexander Adensamer**

Authors: Alexander Adensamer and David Rueckel

Session 13: **RULE ADHERENCE & DIGITIZATION - IMPACT ON BUS. MODELS AND RELEVANCE TO INTER-ENTERPR. COLLABORATIONS**

Paper 16:

Uncover and Assess Rule Adherence Based on Decisions

Presenter: **Johan Silvander**

Authors: Johan Silvander and Mikael Svahnberg

Paper 22:

Digitization Driven Design – A Guideline to Initialize Digital Business Model Creation

Presenter: **Tobias Greff**

Authors: Tobias Greff, Christian Neu, Denis Johann, Dirk Werth

Paper 23:

Exploring Barriers in Current Inter-enterprise Collaborations: a Survey and Thematic Analysis

Presenter: **Nikolai Kazantsev**

Authors: Nikolay Kazantsev, Grigory Pishchulov, Nikolay Mehandjiev, Pedro Sampaio

Paper 24:

Smart Factory Modelling for SME, Modelling the Textile Factory of the Future

Presenter: **Marco Barteld**

Authors: Michael Weiß, Meike Tilebein, Rainer Gebhardt, Marco Barteld

Session 14: **BUSINESS-IT ALIGNMENT, ONTOLOGY-BASED MODELING, AND SUPPLY-CHAIN APPLICATIONS**

Paper 25:

Configuring Supply Chain Business Processes Using the SCOR Reference Model

Presenter: **Ayalew Kassahun**

Authors: Emmanuel Ahoa, Ayalew Kassahun, Bedir Tekinerdogan

Paper 26:

Strategy-IT Alignment, Assuring Alignment Using a Relation Algebra Method

Presenter: **Lloyd Rutledge**

Authors: Frank Grave, Rogier van de Wetering, Lloyd Rutledge

Paper 27:

An Ontology-Based Expert System to Detect Service Level Agreement Violations

Presenter: **Alper Karamanlioglu**

Authors: Alper Karamanlioglu and Ferda Nur Alpaslan

BMSD'18: List of Accepted Papers (Cont.)

Session 15: **IT ARCHITECTURES AND SOFTWARE ECOSYSTEMS**

Paper 28:

Multi-sided Platforms for the Internet of Things

Presenter: **Thibault Degrande**

Authors: Thibault Degrande, Frederic Van Nieuwenborg, Sofie Verbrugge, Didier Colle

Paper 30:

Design Options of Store-Oriented Software Ecosystems: An Investigation of Business Decisions

Presenter: **Bahar Jazayeri**

Authors: Bahar Jazayeri, Olaf Zimmermann, Gregor Engels, Jochen Kuster, Dennis Kundisch, Daniel Szopinski

Paper 33:

Towards a Methodology for Designing Micro-Service Architectures Using $\mu\sigma$ ADL

Presenter: **Tasos Papapostolu**

Authors: Tasos Papapostolu and Dimitar Birov

Session 16: **SOFTWARE DEVELOPMENT AND IoT APPLICATIONS**

Paper 34:

Monitoring the Software Development Process With Process Mining

Presenter: **Saimir Bala**

Authors: Saimir Bala and Jan Mendling

Paper 35:

A Conceptual Tool to Improve the Management of Software Defects

Presenter: **Nico Hillah**

Author: Nico Hillah

Paper 29:

Towards Context-Aware Vehicle Navigation in Urban Environments: Modeling Challenges

Presenter: **Boris Shishkov**

Authors: Ivan Garvanov, Christo Kabakchiev, Boris Shishkov, Magdalena Garvanova