Record Nr. UNISA996464387503316 **Titolo** Software engineering and formal methods: SEFM 2020 collocated workshops: ASYDE, CIFMA, and CoSim-CPS, Amsterdam, The Netherlands, September 14-15, 2020, revised selected papers / / Loek Cleophas and Mieke Massink (editors) Pubbl/distr/stampa Cham, Switzerland:,: Springer,, [2021] ©2021 **ISBN** 3-030-67220-4 Edizione [1st ed. 2021.] 1 online resource (IX, 335 p. 178 illus., 77 illus. in color.) Descrizione fisica Programming and Software Engineering;; 12524 Collana Disciplina 005.1 Software engineering Soggetti Computer logic Formal methods (Computer science) Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Includes index. Nota di contenuto Model Translation from Papyrus-RT into the nuXmv Model Checker --Modeling and Verification of Temporal Constraints for Web Service Composition -- Modeling Attack-Defense Trees' Countermeasures

Modeling and Verification of Temporal Constraints for Web Service Composition -- Modeling Attack-Defense Trees' Countermeasures using Continuous Time Markov Chains -- Automated Validation of State-Based Client-Centric Isolation with TLA+ -- Code Coverage Aware Test Generation Using Constraint Solver -- From Requirements to Verifiable Executable Models using Rebeca -- A Pragmatic Model of Justification for Social Epistemology -- Personal Identity and False Memories -- Against the Illusory Will Hypothesis. A Reinterpretation of the Test Results from Daniel Wegner and Thalia Wheatley's I Spy Experiment -- Understanding responses of individuals with ASD in syllogistic and decision-making tasks: A formal study -- Symbolic and Statistical Theories of Cognition: Towards Integrated Artificial Intelligence -- An Interdisciplinary Model for Graphical Representation -- Information Retrieval from Semantic Memory: BRDL-based Knowledge Representation and Maude-based Computer Emulation -- A Multi-Agent Depth Bounded Boolean Logic -- The intensional structure of epistemic convictions -- Short-circuiting the definition of

mathematical knowledge for an Artificial General Intelligence -Reasoning about Ignorance and Beliefs -- A Case Study on Formally
Validating Motion Rules for Autonomous Cars -- Modelling Train Driver
Behaviour in Railway Co-simulations -- Cross-level Co-simulation and
Verification of an Automatic Transmission Control on Embedded
Processor -- A Semantic-Aware, accurate and efficient API for (co-)
simulation of CPS -- An FMI-Based initialization plugin for INTO-CPS
Maestro 2 -- Introducing Regression Tests and Upgrades to the INTO-CPS Application -- Cosimulation-based Control Synthesis.

## Sommario/riassunto

This volume constitutes the revised selected papers from the three workshops collocated with the 18th International Conference on Software Engineering and Formal Methods, SEFM 2020, held in Amsterdam, The Netherlands, in September 2020. The 15 full papers presented together with 8 short papers in this volume were carefully reviewed and selected from a total of 35 submissions. The contributions that are collected in this volume have been selected from the presentations at the following workshops: ASYDE 2020: Second International Workshop on Automated and Verifiable Software System Development; CIFMA 2020: Second International Workshop on Cognition: Interdisciplinary Foundations, Models and Applications; and CoSim-CPS 2020: Fourth International Workshop on Formal Co-Simulation of Cyber-Physical Systems. Due to the Corona pandemic this event was held virtually.