Wissenschaftliche Publikationen:
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Eingeladene Vorträge

1. Rauh, Andreas: *Intervallmethoden für Analyse und Entwurf von Steuerungen und Regelungen — Theorie, Implementierung und Anwendungen*, Automatisierungstechnisches Kolloquium, Ruhr-Universität Bochum, Germany, April 28, 2009.

2. Rauh, Andreas: *Interval-Based Robust Control Design with State and Disturbance Estimation for Distributed Parameter Systems*, Technical University of Varna, Bulgaria, October 7, 2009.

3. Rauh, Andreas; Aschemann, Harald: *Interval Techniques for Reliable Control of Dynamical Systems with Applications to Control of Distributed Heating Systems*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, March 25, 2010.

4. Rauh, Andreas; Aschemann, Harald: *Sensitivity Analysis for the Synthesis of Open-Loop and Closed-Loop Controllers*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, September 09, 2010.

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7. Rauh, Andreas; Aschemann, Harald: *Observer Design for State and Parameter Estimation in Distributed Heating Systems*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, March 22, 2011.

8. Rauh, Andreas; Dittrich, Christina; Senkel, Luise; Aschemann, Harald: *Design of State and Parameter Estimation Strategies for Water Supply Systems*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, October 06, 2011.

9. Rauh, Andreas; Senkel, Luise; Dittrich, Christina; Aschemann, Harald; Kostin, Georgy V.; Saurin, Vasily V.: *Reliable Finite-Dimensional Modeling and Control of a Distributed Heating System*, Institute of Control and Computation Engineering, University of Zielona Gora, Poland, April 19, 2012.

10. Rauh, Andreas; Senkel, Luise; Dittrich, Christina; Aschemann, Harald: *Observer-Based Predictive Temperature Control for Distributed Heating Systems Based on the Method of Integrodifferential Relations*, Institute of Physics, University of Torun, Poland, November 08, 2012.

11. Rauh, Andreas; Senkel, Luise; Aschemann, Harald: *Experimental Validation of Feedback Control Strategies for a Spatially Two-Dimensional Heat Transfer Process: A Comparison Between Finite Volume and Finite Element Models*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, October 01, 2013.

12. Aschemann, Harald; Schindele, Dominik; Rauh, Andreas: *Norm-Optimal Iterative Learning Control for a Heating Rod Based on the Method of Integro-Differential Relations*, A. Ishlinsky Institute for Problems in Mechanics, Russian Academy of Sciences, Moscow, October 01, 2013.

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15. Rauh, Andreas; Prabel, Robert; Aschemann, Harald: *Oscillation Attenuation for Crane Payloads by Controlling the Rope Length Using Extended Linearization Techniques*, Institute of Control and Computation Engineering, University of Zielona Gora, Poland, March 30, 2017.

16. Rauh, Andreas; Kersten, Julia: *An Interval Observer-Based Branch-and-Bound Procedure for Verified Parameter Identification of Cooperative Systems*, Ishlinsky Institute for Problems in Mechanics of the Russian Academy of Sciences, Moscow, Russia, October 11, 2018.

17. Rauh, Andreas; Kersten, Julia: *A Unified Interval Approach for Parameter Identification, State Estimation and Robust Control of Spatially Distributed Heating Systems with Uncertainty*, 5-Part Lecture Series, Université Paris-Saclay, Evry, France, March 18–21, 2019. `https://www.ibisc.univ-evry.fr/deux-seminaires-organises-a-ibisc-les-18-et-21-mars-2019-site-pelvoux-en-presence-de-andreas-rauh-et-de-julia-kersten-univ-rostock-allemagne/`.

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