

Thomas Nigitz, Ph.D.

Work experience

Since 2015 Scientific employee at
BEST – Bioenergy and Sustainable Technologies GmbH
Since 2020 Senior Researcher – Automation and Control
2018 - 2020 Researcher – Automation and Control
2015 - 2017 Junior Researcher – Automation and Control
2005 - 2013 Technical intern at different companies
2013 Kristl, Seibt & Co
2012 Magna E-Car Systems GmbH & Co OG
2012 Liebherr-Werk Nenzing GmbH
2011 ISA - Innovative Systemlösungen für die Automation
2009 Kristl, Seibt & Co
2007 / 2008 Andritz AG
2005 / 2006 Magna Powertrain AG

Education

2015 - 2020 Ph.D. candidate of Control Engineering at Graz University of Technology
2009 - 2015 M.Sc. in Electrical Engineering at Graz University of Technology with
specialisation in Automation and Mechatronics
2008 A-levels at HTBLuVA BULME Graz with specialization in Electrical
Engineering and Automation

Research Areas

- Advanced process control with focus on model-based algorithms
- Virtual commissioning of process plants
- Soft sensors and predictive maintenance

Selected Publications

Nigitz, T., Arlt, S., Poms U., Weber G., Luisser M. & Gölles, M.: Technology and process improvement of a demonstration unit for a novel aqueous phase reforming process via virtual commissioning, 30th European Biomass Conference and Exhibition, 2022, to be published in May 2022

Nigitz, T., Gölles, M., Aichernig, C., Schneider, S., Hofbauer, H., Horn, M.: Increased efficiency of dual fluidized bed plants via a novel control strategy, Biomass and Bioenergy 2020; 141:105688

Nigitz T, Gölles M.: A generally applicable, simple and adaptive forecasting method for the short-term heat load of consumers. Applied Energy 2019; 241:73-81