



# LPVS'19

## 3<sup>rd</sup> IFAC Workshop on Linear Parameter-Varying Systems



November 4-6, 2019  
Eindhoven, The Netherlands

<http://lpvs2019.tue.nl/>

The Organizing Committee has the pleasure to invite you to participate in the 3<sup>rd</sup> IFAC Workshop on Linear Parameter-Varying Systems (LPVS'19) to be held in Eindhoven, The Netherlands, November 4-6, 2019.

The workshop aims at attracting researchers interested in the field of Linear Parameter-Varying systems and their applications in engineering problems, as well as experts interested in discussing new trends, exchange new ideas, establish fruitful contacts, and promote interactions among relevant fields of interest. Submissions dealing with the application of LPV modelling and control approaches to emerging applications and industrial contributions are strongly encouraged together with tutorials and software demonstrations. Paper submissions are possible via [PaperCept](#) and proceedings of the workshop are published online in [IFAC-PapersOnline series](#), hosted on [ScienceDirect](#).

**BACKGROUND AND SCOPE:** The topics of the workshop will cover the general area for the modelling, analysis, observation and control of LPV systems:

- **Modelling and identification of LPV systems:** how to obtain LPV models for nonlinear, switching, time-delay, sampled-data, uncertain, saturating or polynomial systems together with applied machine learning for LPV systems.
- **Analysis with LPV tools:** stability and stabilization, robustness issues, geometric approaches, structural analysis.
- **Observation and diagnosis by LPV methods:** observer design, fault detection and isolation, predictive maintenance and monitoring.
- **LPV control of systems:**  $H_\infty/H_2$  control, optimal control, predictive control, constrained control, fault tolerant control, virtual reference feedback tuning, sampled-data control, event and self-triggered control.
- **Applications of LPV modeling and control:** mechatronic, automotive, aerospace, robotics, advanced manufacturing, chemical processes, biological systems, (renewable) energy systems, network systems.

**YOUNG AUTHOR AWARD:** An IFAC Young Author Award will be awarded to an author for the best paper and presentation at the conference. This award is intended to stimulate the involvement of young scientist and engineers in the area of systems and control. (see the details [here](#)).

**VENUE:** LPVS'19 will be held at the Eindhoven University of Technology campus in Eindhoven, The Netherlands. Eindhoven is listed as the most inventive city by Forbes due to the presence of many high-tech and automotive companies in the vicinity. Eindhoven provides excellent opportunities for touristic activities, and easily accessible via close connections to airports (see [here](#)).

All publication material submitted for presentation at an IFAC-sponsored meeting (Congress, Symposium, Conference, Workshop) must be original and hence cannot be already published, nor can it be under review elsewhere. The authors take responsibility for the material that has been submitted. IFAC-sponsored conferences will abide by the highest standard of ethical behavior in the review process as explained on the Elsevier webpage (<https://www.elsevier.com/authors/journal-authors/policies-and-ethics>), and the authors will abide by the IFAC publication ethics guidelines (<https://www.ifac-control.org/events/organizers-guide/PublicationEthicsGuidelines.pdf>).

Accepted papers that have been presented at an IFAC meeting will be published in the proceedings of the event using the open-access IFAC-PapersOnline series hosted on ScienceDirect (<http://www.sciencedirect.com>). To this end, the author(s) must confer the copyright to IFAC when they submit the final version of the paper through the paper submission process. The author(s) retain the right to use a copy of the paper for personal use, internal institutional use at the author(s)' institution, or scholarly posting at an open web site operated by the author(s) or their institution, limited to noncommercial use. Any other use of the paper requires approval by IFAC.

Photo: Norbert van Onna

### IMPORTANT DEADLINES

- April 4, 2019:** Draft paper [submission](#) deadline  
**June 4, 2019:** Acceptance notification, registration opens  
**July 4, 2019:** Final manuscript submission deadline

### REGISTRATION RATES

	Early	Normal
Regular:	€ 500	€ 600
Student:	€ 250	€ 300

### ORGANIZING COMMITTEE

- R. Tóth (General Chair)  
H. Butler (Vice-Chair Industry)  
T. Oomen  
M. Schoukens  
J.W. van Wingerden

### INTERNATIONAL PROGRAM COMMITTEE

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TC 1.1 Modelling, Identification and Signal Processing  
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TC 4.2 Mechatronic Systems

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