# Jovan Odavić

## Curriculum Vitae

 $\bowtie dzovan90@gmail.com$ 



## Education

- 2015–2019 **PhD**, *RWTH Aachen University*, Institut für Theorie der statistischen Physik A, *cum laude*Aachen, Germany
- 2012–2014 **MSc**, *Université de Cergy-Pontoise*, Theoretical Physics and Applications to Complex Systems
  Paris, Île-de-France, France
- 2009–2012 **BCs**, University of Novi Sad, Faculty of Sciences, Department of Physics, Novi Sad, Republic of Serbia

## Research experience

- 2020- Postdoctoral researcher, Institut Ruđer Bošković, Zagreb, Croatia
- 2015-2019 **PhD Thesis**, RWTH Aachen University, Institut für Theorie der statistischen Physik A thesis title: 'Density oscillations of one-dimensional correlated electron systems from Density Functional Theory' Aachen, Germany
  - 2014 Master Thesis, Université Paris-Sud 11, The Laboratory of Theoretical Physics and Statistical Models (LPTMS) thesis title: 'Universal properties of 2D statistical models at the critical point: a Conformal Field Theory approach'
    Orsay, Île-de-France, France

## Teaching Experience

- 2018–2019 **RWTH Aachen University**, Teaching assistent (TA), Institute of Condensed Matter Physics, Statistical Physics BSc course Prof. Dr. S. Wessel
- 2016–2017 **RWTH Aachen University**, Teaching assistent (TA), Institut für Quantentinformation, Theoretical Classical Mechanics BSc course Prof. Dr. F. Hassler

- 2016–2016 **RWTH Aachen University**, Teaching assistent (TA), Institute of Condensed Matter Physics, Statistical Physics BSc course Prof. Dr. S. Wessel
- 2015–2016 **RWTH Aachen University**, Teaching assistent (TA), Institut für Theorie der statistischen Physik, Statistical Physics BSc course Prof. Dr. H. Schoeller
- 2015–2015 **RWTH Aachen University**, Teaching assistent (TA), Institut für Theorie der statistischen Physik, Quantum Mechanics BSc course Prof. Dr. H.-J. Kull

#### **Publications**

- 2021 J. Odavić, P. Mali: Random matrix ensembles in hyperchaotic classical dissipative dynamic systems, J. Stat. Mech. (2021) 043204, DOI: 10.1088/1742-5468/abed46
- 2020 J. Odavić, N. Helbig, V. Meden: Friedel oscillations of one-dimensional correlated fermions from perturbation theory and density functional theory. Eur. Phys. J. B(2020) 93: 103, DOI: 10.1140/epjb/e2020-10127-1
- J. Odavić: Density oscillations of one-dimensional correlated electron systems from density functional theory. 06/2019, Dissertation / PhD Thesis, Supervisor: Nicole Helbig, Volker Meden, Herbert Schoeller, DOI:10.18154/RWTH-2019-06134
- 2017 I. Sokolović, P. Mali, J. Odavić, S. Radošević, S. Yu. Medvedeva, A. E. Botha, Yu. M. Shukrinov, J. Tekić: Devil's staircase and the absence of chaos in the dc- and ac-driven overdamped Frenkel-Kontorova model. Physical Review E 08/2017; 96(2), DOI:10.1103/PhysRevE.96.022210
- 2016 J. Odavić, P. Mali, J. Tekić, M. Pantić, M. Pavkov Hrvojević: Application of largest Lyapunov exponent analysis on the studies of dynamics under external forces. Communications in Nonlinear Science and Numerical Simulation 10/2016; 47, DOI:10.1016/j.cnsns.2016.11.010
- 2015 J. Odavić, P. Mali, J. Tekić: Farey sequence in the appearance of subharmonic Shapiro steps. Physical Review E 05/2015; **91**(5), DOI:10.1103/PhysRevE.91.052904

## Relevant Awards

- Best poster award of the 2018 workshop of the RTG 1995 Quantum Many-body Methods in Condensed Matter Systems
- Merit Scholarship: Bourses master Ile-de-France (scholarship for research master programs in the city of Paris)

## Computer skills

• Computer languages: Fortran, Mathematica, Python, Latex, PHP, MySQL, C and C++

#### Soft skills

- Teaching (see Teaching Experience)
- Organization (Informal Friday Talks RWTH Aachen University doctoral student seminar/journal club)
- Languages: English (Cambridge Certificate of Proficiency C2 level), German (Intermediate level B1/B2), French (Intermediate level B1), Serbian Mother tongue

#### Invited talks

- Institut Rudjer Bošković, Colloquium of the Department Computational Biophysics and the Department of Theoretical and Computational Chemistry, 10/2019, Republic of Croatia
- Institute of Physics Belgrade, Scientific Computing Laboratory (SCL) seminar, Center for the Study of Complex Systems, 09/2019, Republic of Serbia

### General interests and leasure

- statistical physics, low dimensional quantum systems, strongly correlated physics, integrable systems, nonlinear dynamics and chaos theory.
- arts and painting

#### External links

- https://www.researchgate.net/profile/Jovan Odavic2
- $\circ$  https://scholar.google.com/citations?user=cHrYEeQAAAAJ
- o https://orcid.org/0000-0003-2729-8284