TU Wien Informatics Doctoral School

Information Event
October 2, 2023

Andreas Steininger
Doctoral Education at our Faculty

common roof formed by
TU Wien Informatics Doctoral School

different ways of funding a doctoral degree at our faculty

- Doctoral Colleges
- Teaching Assistants
- Research Assistants
- Self-Funded PhDs
... 

different areas, different institutes, different supervisors, ...

but the same curriculum, process, evaluation criteria apply to every doctoral student

the Doctoral School is not a secluded club –
every doctoral student is considered member of our Doctoral School

currently 390
Excellent Supervision

- Well-thought Dissertation Process
- Quality Assurance
- Structured Curriculum
- Top-class Guest Professors
- Information & Support of Students
- Teambuilding & Socializing
Mission:

✓ ...to provide you with an environment that encourages you to contribute to technology advancement through systematic, yet creative research. Our program enables you to become an independent researcher capable of generating, pursuing, and communicating novel research ideas. To achieve this, you will be involved in research activities as soon as possible.

Services (in tight cooperation with the Deans of Academic Affairs & Dean’s Office):

✓ maintain unified interface inside and to the outside (webpage, Q&A)
✓ implement the basic curriculum (mandatory lectures)
✓ organize guest lectures (selection, invitation, operation...)
✓ organize special courses in house (Current Trends in CS, Proposal Writing)
✓ stimulate teambuilding (social events)
✓ keep contact to doctoral students, provide aid (relay info, give pointers when problems)
✓ inform (events), coordinate, provide facts & figures
The Path to the Doctoral Degree

1. **Enrolment**
   - Admission

2. **Proficiency Exam**
   - Thesis V1
   - Thesis agreement

3. **Pre-submission**
   - 2 reviews

4. **Revised Thesis**
   - Final submission
   - 2 reviews

5. **Defense**

Timeline:
- 6...18 mo
- 8 wks reviewing
- ~4wks revision
- ~3wks reviewing
- 2wks inspection
Quality Assurance

- early feedback & transparency through proficiency exam
- extra guidance by PE members: National Expert & Chair
- extra certainty through clear commitments in thesis agreement
- grading of thesis by 2 independent experts
- possibility for thesis revision
- thesis & reviews open for inspection by faculty
Structured Curriculum

18 ECTS
PhD Curriculum

Proficiency Exam

6.0 Fundamental Courses

3.0 PhD Seminar

9.0 Area Courses

3.0 Doc School’s Guest Professor course

Free Choice, related to PhD area

3.0 Philosophy of Science
3.0 Fundamental Research Methods
3.0 Career Planning
3.0 Crafting Good Professional Life
3.0 Digital Humanism
3.0 Scientific Proposal Writing

PhD Defense

Submission of plan after proficiency exam; needs approval!

Admission & Enrolment
As a reminder: In total minimum 18 ECTS required

- **fundamental courses**
  - Philosophy of Science (M)
  - Research & Career Planning for Doctoral Students (M)
  - Fundamental Research Methods for Doctoral Students (M)
  - Crafting Good Professional Life
  - Digital Humanism
  - Scientific Proposal Writing
  
  *min 6 ECTS, min 1 methodology*

- **area courses**
  - PhD seminar, 3 ECTS
  - visiting professor courses, min 3 ECTS
  - own choice of courses related to research area
  
  *min 12 ECTS, at most 6 ECTS seminar or PV*

*submission of plan after proficiency exam; need approval!*
Important Sources of Information

• Information of the Dean’s Office about Doctoral Study Process
  https://informatics.tuwien.ac.at/study-services/doctoral-graduation/

• Webpage of the TU Wien Informatics Doctoral School
  https://informatics.tuwien.ac.at/doctoral/

• Standard Procedure for Doctoral Program at the Faculty of Informatics
  https://informatics.tuwien.ac.at/doctoral/procedure/

• Registration to Doctoral School news:
  https://inn.tuwien.ac.at/socialevents_doctoralstudents

• Admission Office
  https://www.tuwien.at/en/studies/admission/the-conditions-for-international-students/doctoral-programme/
### TU Wien Informatics Doctoral School

#### 2023W-2024S (2011U)

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<tr>
<th>Title</th>
<th>Precon.</th>
<th>Hours</th>
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<td>VU Philosophy of Science</td>
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<td><strong>Area Courses</strong></td>
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<td>VU PhD Primary Area Computer Engineering Introduction</td>
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2023

<table>
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<tr>
<th>Guest Professor</th>
<th>University/Affiliation</th>
<th>Country</th>
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<tr>
<td><strong>Ricardo Baeza-Yates</strong></td>
<td>Northeastern University</td>
<td>USA</td>
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<tr>
<td><strong>Pedro Cabalar</strong></td>
<td>University of A Coruña</td>
<td>Spain</td>
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<tr>
<td><strong>Antonio A. Casilli</strong></td>
<td>Polytechnic Institute of Paris</td>
<td>France</td>
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<tr>
<td><strong>Werner Dietl</strong></td>
<td>University of Waterloo</td>
<td>Canada</td>
</tr>
<tr>
<td><strong>Gordana Dodig-Crnko</strong></td>
<td>Mälardalen University and Chalmers University</td>
<td>Sweden</td>
</tr>
<tr>
<td><strong>Ann Light</strong></td>
<td>University of Sussex</td>
<td>UK</td>
</tr>
<tr>
<td><strong>George Metakides</strong></td>
<td>Digital Enlightenment Forum</td>
<td>Netherlands</td>
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<tr>
<td><strong>Matti Tedre</strong></td>
<td>University of Eastern Finland</td>
<td>Finland</td>
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Area Courses by Guest Professors – WS23

- **Program Analysis**
  Course 199.014
  Course start: Oct 3
  Lecturer: Prof. Werner Dietl,
  University of Waterloo, Canada

- **Democracy in the Digital Era**
  Course 199.015
  Course start: Nov 6
  Lecturer: Prof. George Metakides,
  Digital Enlightenment Forum, NL

- **Algorithms for Graph Analysis**
  Course 199.016
  Course start: Oct 30
  Lecturer: Prof. Martin Nöllenburg
  Guest researcher: Prof. Petra Mutzel,
  University of Bonn, Germany
From surviving to thriving: crafting your good professional life, course 199.096
schedule: course start Oct 6
Lecturer: Prof. Geraldine Fitzpatrick

Research and Career Planning for Doctoral Students, course 195.098 = course 184.778
schedule: course start Oct 13
  - Lecturer: Prof. Georg Gottlob

Philosophy of Science, course 195.080
schedule: to be announced
  - Lecturer: Prof. Matti Tedre / University of Eastern Finland
Fundamental Courses – Preview Summer Term

- **Fundamental Research Methods for Doctoral Students,**
course 195.079
  - Introduction to Methodologies and Paradigms
  - Qualitative Methods
  - Formal Methods
  - Quantitative Methods
  - Design Methods

- **ProWriting – Effective Research Project Proposal Writing for Public Funding,**
course 195.109
  - Lecturers: S. Biffl, A. Ciabattoni, C. Maszl-Kantner, E. Schludermann, A. Steininger
Current Trends in Computer Science (VU 1.5, 195.072)

- Ring lecture with talks given by the guest professors of the current study year
- offered throughout winter and summer term
- Highly probable that we have at least 5 talks in total during this study year 2023/24
First talk scheduled for Oct 12, 2023.

requirements for positive grade:

Preferably students attend 4 talks, choose 3 of those for their report and give a summary of at least 2 pages for each.
For students who can only attend 3 talks this summary must comprise at least 3 pages for each talk.
(The course will end after the summer term, a further combination with talks of the winter term 24/25 will not be possible.)
Informatics

Information, Teambuilding, Socializing

- Regular Info Events (process, upcoming guest prof courses, Q&A,...)
- Social Events
  - Special-focus Guided Tours
    („Vienna for students“, „Hidden Secrets of Vienna“, ...)
  - Visit & Tour of Ottakringer Beer Brewery
  - Visit of Vienna Museum of History
  - Visit of Christmas Market
  - ...

TU WEN
You want to receive information about future social events

• please register here:

https://inn.tuwien.ac.at/socialevents_doctoralstudents
Thank you!