# Otto-Friedrich-Universität Bamberg

Otto-Friedrich-Universität Bamberg • Feldkirchenstraße 21 • 96052 Bamberg

Lehrstuhl für VWL, insb. Empirische Mikroökonomik

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http://www.uni-bamberg.de/vwl-mikro/

The tutorial will be taught online. Students who want to enroll in the tutorial must send an email to Daniela Araujo (daniela.araujo@uni-bamberg.de) by **12.04.2021**, in order to get access to the VC-course and further information on the technical implementation of the course. Please note that we are working on solutions to offer at least a few sessions in the form of hybrid-events (combination of in person and remote sessions). Students will be informed about this during the semester.

## Summer 2021

## Tutorial: Stata – Advanced Course

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| **Participants:** | Students of the "Applied Economics of Education" course and, if capacity is available, students of other programs (Bachelor and Master). |
| **Time and place:** | Wed. 10:00 - 12:00, online |
| **Start:** | April 14, 2021 |
| **Course Language:** | English |
| **Requirements:** | **"**Empirische Mikroökonomik" (BAEES4.5) |

### Brief description

The statistics software Stata is one of the most widely used software in economics and social sciences. The course offers students the possibility to learn about this software at an advanced level.

The course is open to participants of the "Applied Economics of Education" course and, if capacity is available, to students of other courses and programs (Bachelor and Master). In general, the course is relevant for students who aim to write a term paper in applied economics or who want to write an empirical B.Sc. or M.Sc. thesis in the field of labor, education or development economics.

In detail, this course will cover:

- A Stata "Crash Course" for beginners
- Implementation of methods of causal inference using Stata, including:
  - Randomization (experimental evaluation design)
  - Panel data techniques
  - Instrumental-Variable (IV) approach
  - Regression-Discontinuity (RD)
  - Difference-in-Differences (DID)
  - Propensity Score Matching (PSM)
- Replication of published empirical papers

Previous experience with Stata is not mandatory, but is highly recommended. The course will start with a "Crash Course" for beginners, which will briefly present the material covered in the "Introduction to Stata (WS 20/21)" course. Therefore, students with no previous experience are encouraged and asked to take own initiative in filling potential gaps.

Throughout the course, students will be familiarized with the difference of correlative and causal evidence. When implementing the methods of causal inference using Stata, a short and intuitive presentation of the respective method will be given. However, students are encouraged to take own initiative for a deeper understanding of the techniques, e.g. with further materials and readings, which will be provided in class.

**Software:** Free access to online Stata licenses will be offered.

**Main material and readings:**

Cameron, A. C., & Trivedi, P. K. (2010). Microeconometrics using Stata, revised edition. StataCorp LP.

Khandker, S., B. Koolwal, G., & Samad, H. (2009). Handbook on Impact Evaluation. The World Bank. https://doi.org/10.1596/978-0-8213-8028-4

VC Course "Introduction to Stata (WS20/21)"