





# Call for Participants **Data Simulation with Monte Carlo Methods**

November 23rd, 2022, 1-6:30 pm

# Instructor: Dr. Marko Bachl (University of Hohenheim)

organized by the Computational Methods Working Group (CMWG) at the University of Zurich & ETH Zurich, Switzerland

In any social research design, researchers are faced with a variety of design and fine-tuning choices that may influence the consistency, size, and direction of estimates. To understand the consequences of such decisions, scholars increasingly turn to simulation methods: By artificially generating data and running thousands of experiments via so-called Monte Carlo simulations, they can probe how methodological decisions affect their outcome of interest. Scholars for instance use such approaches to study how different degrees of intercoder reliability or sample sizes influence results of content analyses, especially in linkage studies (e.g., Bachl & Scharkow, 2017; Geiß, 2021), or how varying operationalizations related to survey designs do (e.g., Mangold & Scharkow, 2022). Data simulation methods are also useful to understand and teach statistical methods and to calculate statistical power for complex designs (DeBruine & Barr, 2021).

In response to the growing interest in data simulation, the Computational Methods Working Group (CMWG) offers a one-day workshop on "Data Simulation & Monte Carlo Modeling" with <u>Dr. Marko Bachl</u> (University of Hohenheim). In the workshop, we will (1) discuss use cases of data simulations, (2) familiarize participants with the concept and background of data simulation with Monte Carlo methods, and (3) apply this knowledge in R, which is why prior programming experience in R is an asset.

Date: The workshop will take place online (via Zoom) on November 23rd, 2022.

## Who can apply and how?

We invite early career researchers (i.e., PhD students and scholars who successfully defended their PhD within the last three years) to participate in the workshop. To apply, please fill in this form by October 14th, 2022.

### Do I have to pay a participation fee?

No, thanks to the generous funding by the Graduate School of the Faculty of Arts and Social Sciences at the University of Zurich participation is free.

#### Contact information of the organizing team

Computational Methods Working Group (CMWG), University of Zurich & ETH Zurich E-Mail: <a href="mailto:cssmethods@ikmz.uzh.ch">cssmethods@ikmz.uzh.ch</a> | Web: <a href="mailto:http://www.cssmethods.uzh.ch">http://www.cssmethods.uzh.ch</a>

Jennifer Victoria Scurrell (ETH Zurich), Markos Mpadanes (University of Zurich), Lara Kobilke (LMU Munich), Valerie Hase (LMU Munich)