MULTILEVEL MODELS, STRUCTURAL EQUATIONS & LONGITUDINAL DATA

September 13-14 2021

Unimail, room MR150 and online

Zoom link: https://unige.zoom.us/j/92896390381?pwd=Z2JXbVhIK0lOajhBQk93a1lXajMwUT09

Meeting ID: 928 9639 0381
Secret Code: 714086

MONDAY, SEPTEMBER 13 – MULTILEVEL MODELS

09:00 – 09:10   **Welcome address and presentation of the participants**

09:10 – 10:30   **Theory and methods of multilevel modelling – Davide Morselli (UNIL/LIVES)**

10:30-11:00 Coffee break

11:00-12:30   **Empirical example: Income Inequality and Psychological Health – Nicolas Sommet (UNIL/LIVES)**

12:30 – 14:00 Lunch

14:00 – 14:45   **Data structure and multilevel models for longitudinal analysis – Davide Morselli**

14:45 – 15:30   **Empirical example: Retrospective evaluation of happiness – Nora Dasoki (FORS/LIVES)**

15:30-16:00 Coffee break

16:00 – 17:00   **Q&A on Methods: other extensions**

Logistic models, multilevel mediation models

19:00 Dinner in Geneva (place tbc)

TUESDAY, SEPTEMBER 14 – STRUCTURAL EQUATION MODELING

09:00 – 10:30   **Structural Equation Modeling: key concepts and models for longitudinal data – Emilie Joly-Burra (UNIGE/LIVES)**

10:30-11:00 Coffee break

DOCTORAL PROGRAMME – MULTILEVEL MODELS, STRUCTURAL EQUATIONS & LONGITUDINAL DATA – SEPTEMBER 13-14, 2021

11:00 – 11:45 **Growth Curve Models with Latent and Binary Dependent Variables in the SEM Framework – Dan Orsholits (UNIGE/LIVES)**

11:45 – 12:30 **Q&A -** Similarities and differences between the two approaches to longitudinal data

12:30 – 14:00 Lunch

14:00 – 15:30 **Application of the mixed-effects models to epidemiological data – Boris Cheval (UNIGE/CISA)**

15:30-16:00 Coffee break

From 16:00 Stefan Sieber's thesis defense and apero! For those who want to join, please contact him!

Compulsory readings:

- Hoyle, R. H. (1995). The Structural Equation Modeling Approach: Basic Concepts and Fundamental Issues. In R. H. Hoyle (Éd.), *Structural Equation Modeling: Concepts, Issues, and Applications* (p.1-15). Thousand Oaks, California: SAGE.
- Stoel, R. D., van den Wittenboer, G. L. H., & Hox, J. J. (2003). Analyzing longitudinal data using multilevel regression and latent growth curve analysis. *Metodologia de las Ciencias del Comportamiento*, 5, 1-21.

Additional readings:

- Sommet, N., & Morselli, D. (2017). Keep calm and learn multilevel logistic modeling: A simplified three-step procedure using Stata, R, Mplus, and SPSS. *International Review of Social Psychology, 30*, 203-218. http://doi.org/10.5334/irsp.90
- Enders, C. K., & Tofighi, D. (2007). Centering predictor variables in cross-sectional multilevel models: a new look at an old issue. *Psychological methods, 12(2),* 121-138. https://doi.org/10.1037/1082-989X.12.2.121
- Preacher, K. J. (2010). Latent growth curve models. In G. R. Hancock & R. O. Mueller (Éds.), *The reviewer's guide to quantitative methods in the social sciences* (p. 185-198). London: Routledge.
- McNeish, D., & Matta, T. (2018). Differentiating between mixed-effects and latent-curve approaches to growth modeling. *Behavior Research Methods, 50(4)*, 1398-1414. https://doi.org/10.3758/s13428-017-0976-5