
Microeconometrics of panel data**Anne-Laure Samson****OUTLINE**

Chapter 1 – The error component regression model:

- Why should we use panel data? Their benefits and limitations
- Specification of the error component regression model

Chapter 2 – Estimators of the error component regression model

- Pooled OLS
- The Between estimator
- The Within (or Fixed Effects) estimator
- GLS and FGLS : Generalized Least Squares and Feasible Generalized Least Squares
- Comparison of estimators

Chapter 3 - Specification tests on panel data:

- Mundlak criticism of the error component model
- The Hausman Test comparing the RE and FE estimators
- Testing for the presence of an unobserved effect
- Testing and correcting for sample selection bias : 1) Hausman; 2) Nijman et Verbeek; 3) Semikyna and Wooldridge

Chapter 4 – Estimation of dynamic models

- First difference or fixed effects estimator with instrumental variables (FD-2SLS or FE-2SLS)
- Generalized Method of Moment (GMM) estimator

2 sessions will take place in the computer lab, using the STATA software.

BIBLIOGRAPHIE

- Baltagi, BH. 2005. *Econometric Analysis of Panel Data*, J. Wiley
- Hsiao C. 2005. *Analysis of Panel Data*, Cambridge University Press
- Wooldridge JM. 2002. *Econometric Analysis of cross-section and panel data*. The MIT Press, Cambridge
- Cameron AC and Trivedi P. 2009. *Microeconometrics using STATA*. The STATA Press
- Dormont B. 1989. *Introduction à l'économétrie des données de panel*, Editions du CNRS (repris dans « Introduction à l'économétrie », ed. Montchrestien, 2^{ème} édition (2007)).