

PANEL DATA ECONOMETRICS

Summer School in Economics & Finance, CEMFI
4-8 September 2006

Manuel Arellano

1. Static models

- 1.1 Introduction to panel data.
- 1.2 Unobserved heterogeneity: within-group estimation.
- 1.3 Error components.
- 1.4 Specification tests.
- 1.5 Error in variables.

2. Time series models with error components

- 2.1 Covariance structures.
- 2.2 Autoregressive models with individual effects.
- 2.3 Identification and unit roots.
- 2.4 Models with stationarity restrictions.
- 2.5 Exercises using firm level panel data.

3. Dynamics and predeterminedness

- 3.1 Strict exogeneity and predetermined variables.
- 3.2 Partial adjustment.
- 3.3 Estimation methods.
- 3.4 Multiple individual effects.
- 3.5 Exercise: estimating labour supply models.

4. Binary choice

- 4.1 Unobserved heterogeneity in non-linear models.
- 4.2 Conditional logit.
- 4.3 Random effects probit.
- 4.4 Dynamic discrete choice.
- 4.5 Fixed *versus* random effects.