Advanced Programming in Quantitative Economics

Introduction, structure, and advanced programming techniques

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Tutorial Day 4 - Morning

9.00L Topics

- Style
- Including packages
- Including magic numbers
- Including graphs

10.30P Estimating a duration model

- Transform $0.5 < \beta_2 < 1$
- Graph the durations
- Advanced:
  - Draw $N = 1000, y_i \sim \mathcal{N}(0, \sigma^2)$ for a σ of choice. Make a QQ plot using `DrawQQ`
  - Make the QQ plot 'by hand' using `DrawXMatrix`, drawing the empirical quantiles of the y's against the theoretical quantiles of the normal density
  - Make a residual plot $E_i = (\Lambda_i y_i)^\alpha$ for your y's of the duration model, and a QQ-plot against the Exp(1) density