Potential Econometric Topics for the Senior Exercise

Descriptive Statistics (e.g., mean, variance, covariance)

Confidence Intervals and Hypothesis Testing (as it relates to means and comparisons of means)

Ordinary Least Squares Regression (R^2, Decomposition of Variance, Standard Error of the Regression)

Classical Assumptions

Interpretation of Coefficient Estimates

Confidence Intervals and Hypothesis Testing (as it relates to OLS coefficients)

Statistical and Economic Significance

Functional Form (natural logarithmic transformations, polynomials, indicator variables)

Omitted Variables

Instrumental Variables Estimation (2SLS)

Multicollinearity

Serial Correlation

Heteroskedasticity

Binary Dependent Variable (linear probability model, probit, logit)

Simple Panel Methods (fixed effects)

Simple Time Series Methods (lagged effects including lagged dependent variable, differencing)