

University of Connecticut  
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**Spring 2004, Intermediate Macroeconomics, section 1**

## **ECON 219 Mid-term exam II**

**Name:**

**General recommendations:**

- Read questions thoroughly and answer each.
- Work individually.
- There are four pages.
- No documentation, cell phones, pagers, calculators and bathroom breaks.
- You have until 12:15 and can leave early, if you wish.

1. **[40%]** Circle the correct answer to each of the following questions. Note that there may be several correct answers.

(a) In a Malthusian world, what events would improve the standard of living permanently?

- i. a war;
- ii. a new medical drug;
- iii. a new virus;
- iv. birth control.

(b) In a Malthusian world, what events would improve the standard of living temporarily?

- i. a war;
- ii. a new medical drug;
- iii. a new virus;
- iv. birth control.

(c) In the Solow growth model, suppose a country is somewhat poor. What will happen next?

- i. it becomes poorer;
- ii. the growth rate of capital matches the population growth rate;
- iii. the growth rate of output exceeds the population growth rate;
- iv. the consumption per capita increases.

- (d) Which of these stylized facts of growth are generally accepted as true:
- i. the capital output ratio does not have a trend;
  - ii. the spread between rich and poor countries is getting wider;
  - iii. people move to rich places;
  - iv. capital and labor are sufficient to explain output growth.
- (e) In the intertemporal model, the slope of the budget curve in the  $(c, c')$  space is:
- i.  $1 + r$ ;
  - ii.  $-(1 + r)$ ;
  - iii.  $r$ ;
  - iv.  $-r$ .
- (f) The marginal propensity to consume out of income is:
- i. larger than one;
  - ii. equal one;
  - iii. lower than one;
  - iv. indeterminate.
2. [20%] Explain how and why the labor supply depends on the interest rate.

### 3. [40%]

- (a) Suppose we just made a fundamental discovery that will have a profound impact on the way we produce goods. In terms of the exogenous variables of the intertemporal model of the business cycle with investment, which variable is affected and why?
- (b) Now take the intertemporal model with investment. Show graphically how the macroeconomic equilibrium is modified.

(c) Can such shocks be a good explanation of cyclical fluctuations?

4. **[Bonus: 10%]** Suppose that the guarantee of property rights of firms suddenly becomes uncertain. Within the intertemporal model of the business cycle with investment, what would change. Do not find the new equilibrium, only show which curve would change and explain why.