ECONOMICS 452: INTERNATIONAL FINANCE
MID-TERM EXAMINATION

Instructions:

Write your name and USC identification number in the space provided. You are allowed to have only a calculator and a writing instrument on your desk (no blue books or other pieces of paper). Answer ALL of the questions in the space provided. If necessary, use the backs of the pages, making clear to which question each answer pertains.

You have 110 minutes (until 6.50pm) to finish the exam. All exams will be collected by 6.50pm.

GOOD LUCK!

NAME:...............................................................................................................................

USC ID #:..........................................................................................................................
PART I: (30 marks) Definitions. Define each of the following terms. Be as precise and concise as possible.

i) Arbitrage

ii) Hedging

iii) Speculation

iv) Sterilized foreign exchange intervention

v) Currency crisis

vi) Official settlements balance
PART II: (20 marks) True or False.

Determine whether the following statements are TRUE or FALSE and explain why. Make sure that your explanation is clear and brief.

1. An increase in a country's desired national savings rate accommodates a higher rate of desired domestic investment and will, therefore, promote domestic capital formation.

2. When the spot price of a foreign currency exceeds the forward price of that currency, the foreign currency is trading at a "forward discount" because arbitragers believe it will be less valuable in the future.

3. If the current spot price of a foreign currency rises above the strike price of a put option in that currency, an investor who holds that put option can make a profit by exercising the option immediately and simultaneously transacting in the spot market.
4. The time value of a call option is higher the longer is the time to maturity of the option, the more volatile is the spot price of the underlying currency, and the lower is the expected expiration spot price of the underlying currency relative to the strike price of the option.

PART III: (30 marks) Analytic Question

Assume that a Mexican importing firm, XYZ, needs to have $10,000 in 90 days' time. While the company does hold some $US assets, and has an open positive position in $US, it would prefer not to liquidate (sell) them at this time.

i) List three alternative ways in which the company could obtain this currency in foreign exchange markets, and explain which one(s) might be preferred by the company.
ii) Do you think that the company's preferred method of obtaining foreign currency would have been any different under the fixed exchange rate regime at the beginning of December 1994? Why or why not?

iii) Suppose that the Mexican central bank is abolished tomorrow and a currency board is introduced that pegs the value of the peso against the dollar at one peso/$. How would this affect the current foreign exchange transaction of XYZ company?

iv) How would the establishment of this currency board and peg affect the balance sheet of XYZ company?
v) If most Mexican private sector agents have negative open positions in the dollar, how might the establishment of the currency board and peg affect the Mexican economy through these positions?

**PART IV: (20 marks) Numerical Problem.**

Suppose that the Bank of England has recently (if reluctantly) agreed to peg the pound sterling to the Deutschmark in an effort to promote European Monetary Union. The Bank faces a private demand for DM curve given by

$$Q_d = 40 - 4e$$

where $Q_d$ represents the quantity demanded of DM in billions of DM, and $e$ is the pound price of DM. The private sector supply of DM is given by

$$Q_s = 10 + 2e$$

a) Who demands DM and who supplies DM in the private sector?

b) Suppose that the Bank of England and Bundesbank agree to a pound price of DM of $e=2$. What would be the Bank of England's foreign exchange reserve gain or loss under this exchange rate? Illustrate this diagramatically.
c) What might be the implications of maintaining this exchange rate target over a prolonged period of time for the British economy?