Introduction to Macroeconomics · M7 · 14 Apr 2011

This version amends some errors present in the original version

- 1. The discount factor is directly related to
- (a) the CPI inflation rate.
- (b) the money multiplier.
- (c) the nominal interest rate.
- (d) None of the above
- 2. Which of the following variables measures the general price level of an economy?
- (a) The real interest rate
- (b) The nominal GDP divided by the real GDP
- (c) The monetary base
- (d) None of the above
- 3. Which sentence is false?
- (a) The rate of growth of real GDP may be smaller than the rate of growth of nominal GDP.
- (b) The unemployment rate may be higher than the inflation rate.
- (c) The real interest rate cannot be negative.
- (d) The CPI inflation rate may be different from the GDP deflator inflation rate.
- 4. The Fisher effect refers to
- (a) the unemployment rate and the real GDP.
- (b) the nominal interest rate and the inflation rate.
- (c) the stock of money and the money multiplier.
- (d) None of the above
- 5. A shift to the right of the supply of loans function combined with a shift to the right of the demand for loans function necessarily causes
- (a) a fall in the equilibrium volume of loans.
- (b) a rise in the equilibrium nominal interest rate.
- (c) a fall in the equilibrium nominal interest rate.
- (d) a rise in the equilibrium volume of loans.
- 6. Firms cannot obtain from banks the amount of desired credit. As a result, firms have decided to sell all the government bonds they own. What decision by the central bank can offset the effect on the nominal interest rate caused by the sale of bonds?
- (a) An increase in the reserve requirements
- (b) An increase in the central bank's discount rate
- (c) To carry out an expansionary open market operation
- (d) None of the above
- 7. The nominal interest rate has fallen. A possible explanation is that
- (a) one of every three firms has closed down.
- (b) the central bank has sold government bonds.
- (c) the government budget deficit has risen.
- (d) None of the above
- 8. Which claim about the money multiplier process is not true?
- (a) More deposits give rise to more loans.
- (b) More loans give rise to more expenditure.
- (c) More expenditures give rise to more revenues.
- (d) More revenues give rise to fewer deposits.

- 9. Which sentence is not true?
- (a) GDP at constant prices is a real variable.
- (b) The unemployment rate is a nominal variable.
- (c) According to the Fisher equation, the real interest rate is the nominal interest rate minus the inflation rate.
- (d) Denmark is not a member of the eurozone but Finland is.
- 10. Which sentence is not false?
- (a) If two financial assets differ only in liquidity and profitability, the more liquid asset is always the more profitable one.
- (b) If the government runs a budget deficit (G + TR > T), then there is, necessarily, a trade deficit (NX < 0).
- (c) That an economy has lending capacity means that the government runs a budget surplus (T > G + TR).
- (d) The above three sentences are false.
- 11. Suppose financial assets *A* and *B* differ only in two properties. Which one of the following sentences is more likely to be true?
- (a) If A is more liquid than B, then B should be more profitable than A.
- (b) If A is riskier than B, then B's rate of return should be higher than A's.
- (c) If A is less liquid than B, then A should be riskier than B.
- (d) If A's rate of return is higher than B's, then A should be more liquid than B.
- 12. What may leave the money multiplier unchanged?
- (a) The liquidity ratio *l* falls and the reserve ratio *r* remains constant.
- (b) The liquidity ratio *l* falls and the reserve ratio *r* rises.
- (c) The liquidity ratio l and the reserve ratio r both fall.
- (d) The liquidity ratio l and the reserve ratio r both duplicate.
- 13. Which sentence is not true?
- (a) Triangular arbitrage is not possible when exchange rates are 0.5 \$/€ 3 \$/¥, and 6 €¥.
- (b) There is a tendency for the euro to appreciate against the dollar if the interest rate in the eurozone goes up.
- (c) If the real exchange rate differs from 1, then the nominal exchange is not at its purchasing power parity level.
- (d) Revaluation in a fixed exchange regime is equivalent to depreciation in a floating exchange regime.
- 14. The impossible trinity
- (a) says that triangular arbitrage causes currency crises.
- (b) relates the competitiveness of an economy to the purchasing power parity exchange rate.
- (c) says that spatial arbitrage causes the real appreciation of the exchange rate.
- (d) implies that a country with an independent monetary policy and no capital control cannot adopt a fixed exchange regime.
- 15. In passing from 2 \$/€to 2 €\$,
- (a) the euro appreciates with respect to the dollar.
- (b) the dollar appreciates with respect to the euro.
- (c) the dollar depreciates with respect to the euro.
- (d) None of the above

Write your answers in minuscule letters \cdot No answer: no penalty \cdot Wrong answer: -1/3 of the value of a correct answer \cdot Points: 40%

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15

Introduction to Macroeconomics · M7 · 14 April 2011 ALL THE ANSWERS MUST BE JUSTIFIED

	ALL THE ANSWERS MUST	BE JUSTIFIED	
DNI number	1st Surname	Name	
1. [15%] Define at least five	of the following concepts.		
Real GDP			
GDP deflator			
Flow variable			
M2			
Money multiplier process			
Liquidity of a financial asset			
Open market operation			
Fisher equation			
risher equation			
Purchasing power parity excl	hange rate		
Talendaning power pairty exe			
Devaluation			

2. [4%] Find net exports (NX) if $S = 50$, $I = 10$, $G = 20$, $TR = 5$, and $T = 30$.
3. [4%] Find the approximate value of nominal GDP growth if the GDP deflator inflation rate is 5% and real GDP growth is –5%.
5. [470] I find the approximate value of nominal ODI growth if the ODI deflator inflation rate is 570 and real ODI growth is 570.
4. [4%] The nominal interest rate is 10% and the price of a T-bill is 200. Find the face value of the T-bill.
5. [6%] Find the money multiplier if the liquidity ratio is 0.1, the monetary base is 550, and <i>E</i> (currency held by the public) is 100.
5. [0/6] I ma are money manapher if the inquitary ratio is 0.1, the monetary base is 550, and 2 (currency field by the paone) is 100.
6. [2%] Find the real interest rate if the nominal interest rate is 5% and the CPI is 200.
6. [2%] Find the real interest rate if the nominal interest rate is 5% and the CPI is 200.
7. [25% 15%] (i) The government has established a new tax on financial assets according to which the owner of a financial asset
must annually pay to the government a 10% of the current price of the asset. Explain if the equilibrium nominal interest rate is likely
to rise or fall. Illustrate your explanation by means of a graphical representation of the domestic loan market.
(ii) The central bank wishes to offset the change of the interest rate determined in (i). Indicate three measures by the central bank that can neutralize that change and indicate the effect of one of these measures in a graphical representation of the loan market.
can neutralize that change and indicate the effect of one of these measures in a graphical representation of the foan market.

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8. [0% 15%] (i) Explain if the euro appreciates or depreciates with respect to the dollar if the US real GDP rises. Illustrate your explanation by means of a graphical representation of the currency market. (ii) Address the same two questions (explain and illustrate) if the European Central Bank executes an expansionary open market
(ii) Address the same two questions (explain and illustrate) if the European Central Bank executes an expansionary open market
operation.
(iii) Address the same two questions if the events in (i) and (ii) occur simultaneously.