Indian Statistical Institute, Bangalore

B. Math. Third Year

First Semester - Economics I

Final Semester Exam Duration : 3 hours Date : Nov 12, 2015

Note: Each question carries 1 mark, except for question 28, 30 & 31. Total Marks: 50.

1. Which one of the following is part of the tertiary sector?
   a) Transportation
   b) Marketing and retailing of physical goods
   c) Education
   d) Tourism
   e) All of the above

2. Which one of the following industries is NOT part of the primary sector?
   a) Forestry
   b) Mining
   c) Electricity companies
   d) Farming

3. Textile and clothing production is labor intensive, which means that…
   a) It relies on large capital investments.
   b) It is concentrated in high-wage countries.
   c) It requires a large number of labor hours in proportion to other inputs.
   d) it tends to have higher labor productivity than capital intensive industries.
   e) All of the above.

4. Which one of the following people would NOT be classified as unemployed?
   a) Someone working 20 hours per week in a family business but is not being paid.
   b) Someone in the labor force who has just involuntarily lost their job, and is actively searching for a new one.
   c) Someone in the labor force who has just quit a job, and is actively searching for a new one.
   d) Someone who has just started actively searching for a job after graduating from college.
   e) Someone who took time off to raise a child and has just started actively searching for a job.

5. What type of unemployment would prevent the unemployment from falling to zero, even in a very good job market?
   a) Structural unemployment
   b) Frictional unemployment
   c) Recessionary unemployment
   d) Cyclical unemployment
   e) Efficiency unemployment

6. Which of the following are possible explanations for the existence of sticky wages in the real world?
   a) Wages can be set at particular level by long-term contracts.
   b) Employers may be slow to reduce wages because they fear worker unrest.
   c) Employers may pay workers efficiency wages.
   d) All of the above
   e) None of the above

7. What is the main difference between classical and Keynesian views about the principal determinant of consumption and saving levels?

a) Classical economists believe consumption and saving rates are mainly determined by unemployment rates while Keynesians believe these vary according to the interest rate.
b) Classical economists believe consumption and saving rates are mainly determined by income while Keynesians believe these vary according to the interest rate.
c) Classical economists believe consumption and saving rates are mainly determined by the inflation rate while Keynesians believe these vary according to income levels.
d) Classical economists believe consumption and saving rates are mainly determined by the interest rate while Keynesians believe these vary according to the inflation rate.
e) Classical economists believe consumption and saving rates are mainly determined by the interest rate while Keynesians believe these vary according to income levels

8. Suppose that Jane's income increases from $30,000 per year to $35,000. At the same time, her consumption changes from $26,000 per year to $29,000 per year. What is Jane's marginal propensity to consume?

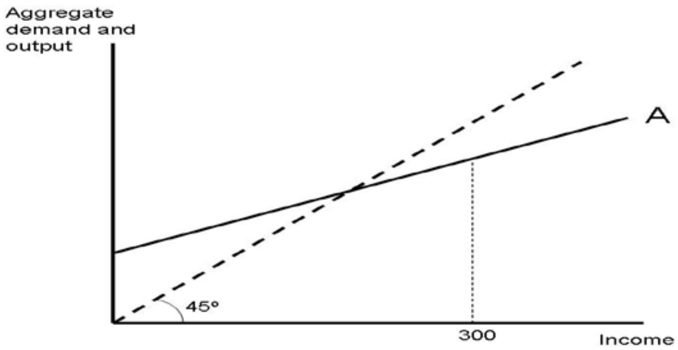
a) 0.1
b) 0.3
c) 0.4
d) 0.6
e) 0.8

9. The manufacturing sector in India accounts for around ------ per cent of GDP and ---- per cent of employment.

a) 60, 62
b) 50, 42
c) 40, 32
d) 30, 22

10. In the below Keynesian cross diagram which one of the following is TRUE at an income level of 300?

a) Households will have saving equal to 300.
b) The level of aggregate demand is higher than the level of output.
c) Businesses will experience excess inventory accumulation*.*
d) Businesses will experience excess inventory depletion.
e) Businesses investment will be equal to 300.



11. What is the equation for the Keynesian income/spending multiplier?

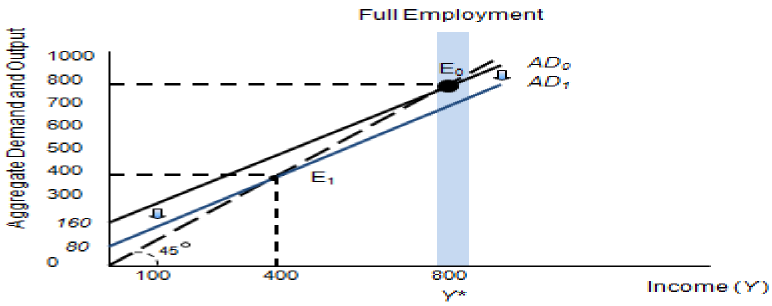
a) mpc / (1 + mpc)

b) 1 / (1 – mpc)
c) mpc / (1 – mpc)
d) 1 / (1 + mpc)
e) (1 – mpc) / (1 + mpc)

12. Suppose the marginal propensity to consume in an economy is 0.9. What would be the Keynesian multiplier in this economy?
a) 1
b) 2
c) 5
d) 10
e) 20

13. Suppose that intended investment dropped from 140 billion to 60 billion dollars, and the marginal propensity to consume is 0.8. If this is an example of a closed economy with no government sector, then output will be expected to drop by …
a) 700 billion dollars.
b) 400 billion dollars.
c) 300 billion dollars.
d) 80 billion dollars.

14. Refer to the figure below. Suppose that when the level of output is 800, the economy is at a full employment level represented by E_0. Imagine that a fall in investor confidence causes the AD line to shift downward to AD_1. Under this new scenario, point E_1 represents a situation …
a) where injections and leakages are equal.
b) of macroeconomic equilibrium.
c) of persistent unemployment.
d) where output, income, and spending are equal.
e) All of the above



15. Suppose the government increases spending by $200 million but at the same time increases taxes by $200 million. In a standard macroeconomic model, by how much would equilibrium output change?
a) Output would increase by $400 million
b) Output would increase by $200 million
c) Output would decrease by $200 million
d) Output would decrease by $400 million
e) We don't have enough information to predict the change in output

16. If the government wants to stimulate the level of economic activity through the use of fiscal policy, then ______________ government spending will raise the level of economic equilibrium, while __________________ government spending will lower it.
a. eliminating; increasing
b. increasing ; decreasing

c. maintaining ; eliminating
d. decreasing ; increasing
e. maintaining; increasing

17. Which one of the following is **not** an example of government transfer payments to individuals or firms?
    a. Social security payments
    b. Unemployment compensation
    c. Interest payments to holders of government bonds
    d. Investment in infrastructure
    e. Agricultural subsidies

18. Which one of the following forms of money is not included in M1?
    a. Currency held by households
    b. Currency held by firms
    c. Checking accounts
    d. Saving accounts

19. Which one of the following statements best describes the chain of events that causes expansionary monetary policy to increase GDP?
    a) Expansionary monetary policy increases the supply of money, which increases aggregate demand, which increases GDP
    b) Expansionary monetary policy lowers interest rates, which increases investment, which increases aggregate demand, which increases GDP
    c) Expansionary monetary policy increases the demand for federal funds, which lowers inflation, which increases consumer confidence, which increases GDP
    d) Expansionary monetary policy lowers interest rates, which lowers inflation, which increases consumer confidence, which increases GDP
    e) Expansionary monetary policy increases the supply of money, which lowers inflation, which increases aggregate demand, which increases GDP

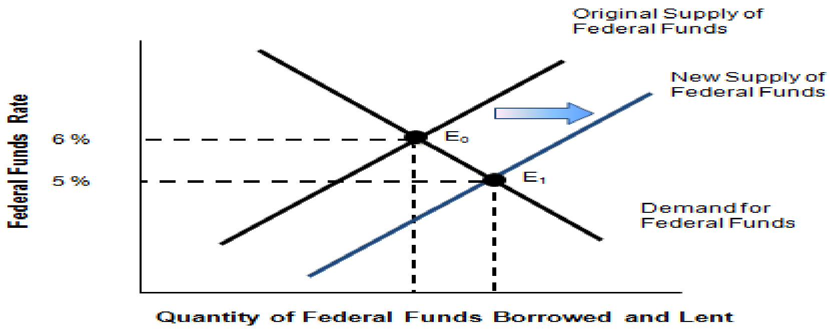
20.The Reserve Bank of India (RBI)'s sale or purchase of government bonds is referred to as…
    a. open market operations.
    b. credit rationing.
    c. quantitative easing.
    d. monetarism.
    e. leverage.

21. When the RBI makes an open market purchase, it immediately increases…
    a. the total currency in circulation.
    b. M1.
    c. M2.
    d. the monetary base.

22. The idea that changes in the money supply affect prices but not output is referred to as…
    a) The liquidity trap.
    b) The accelerator principle.
    c) Monetary neutrality.
    d) The money multiplier.
    e) Keynesian economics

23. Refer to the graph below. Suppose that the Central Bank makes an open market purchase of bonds. All else equal, this ________________ the amount of reserves available for private lending in the federal funds market, and the federal funds rate __________.

a. increases; falls.
b. decreases; increases.
c. decreases; remains constant.
d. has no effect on; remains constant.
e. has no effect on; increases.

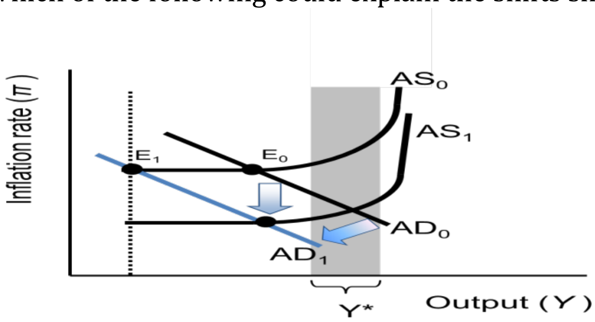


Note: Federal funds refer to Central Bank funds.

24. Recall the quantity equation: M x V = P x Y , where M is the money supply, V is the velocity of money, P is the price level, and Y is real output. Assuming that V is constant, classical monetary theory claims that changes in the money supply impact ____ but not ____.

a. M ; P
b. P ; M
c. P ; Y
d. Y; P
e. P; V

25. Which of the following could explain the shifts shown in the graph below?



a) An increase in government spending and a beneficial supply shock.
b) An increase in investor confidence and an adverse supply shock.
c) Contractionary monetary policy and a fall in people's expectations of inflation.
d) A series of beneficial supply shocks.
e) A fall in people's expectations of inflation.

26. In the balance of payments account, payments for exports of goods and services is counted as …

a) an outflow in the balance on current account.
b) an inflow in the balance on current account.
c) an outflow in the balance on capital account.
d) an inflow in the balance on capital account.
e) part of the statistical discrepancy.

27. If the exchange rate between U.S. dollars and Mexican pesos changes from $1 = 10 pesos to $1 = 12 pesos, then…

a) The US dollar has depreciated against the peso.
b) The Mexican peso has depreciated against the U.S. dollar.
c) The Mexican peso has appreciated against the U.S. dollar.
d) American goods now are relatively cheaper for Mexicans.

28. Refer to the Table below (2 marks).

a) What is the revenue deficit?
b) What is the fiscal deficit

Table: Union budget, India, (in crores of rupees), 2013-14

1	Revenue receipts	1056331
2	Capital receipts, of which	608967
3	Recoveries of loan	10654
4	Other receipts	55814
5	Borrowing and other liabilities	542499
6	Total receipts	1665297
7	Total expenditure, of which	1665297
8	Revenue expenditure	1436169

29. The gross savings rate in India is approximately
a) Less than 10 per cent
b) 15 to 20 per cent
c) 30 to 35 percent
d) None of the above

30. Derive and plot the IS-LM schedules for the following economy. Desired consumption, desired investment and government spending in a closed economy are: (15 marks)

$$C^d = 360 - 200r + 0.1Y$$
$$I^d = 120 - 400r$$
$$G = 120$$

In the same economy, the real money demand function is

$$\frac{M^d}{P} = 100 + 0.2Y - 2000i$$

Assume that $M = 300, P = 2.0, and\ \pi^e = 0$.

31. Consider an economy with the following IS and LM curves: (5 marks)

$$Y = 4350 - 800r + 2G - T \quad \text{(IS)}$$
$$\frac{M}{P} = 0.5Y - 200r \quad \text{(LM)}$$

Suppose that T = G = 450 and that M = 9000. Find an equation for the aggregate demand curve.