

# KyIV SCHOOL of ECONOMICS 

MA in Economic Analysis

Scholarship Exam

## Economics

## NAME:

$\qquad$

## Instructions:

1. Do not turn this page until told to do so.
2. The exam consists of 20 questions that are all equally weighted.
3. Each question has several suggested answers for you to choose from (multiple choice). Attention! Only one answer is correct. If you think that several answers can be correct, choose the most precise and complete one.
4. No dictionaries are allowed.
5. No calculators or other similar devices are allowed. Mobile phones must be switched off for the duration of the exam.
6. Positively no cheating. If caught cheating, you will be asked to leave the room immediately, and your grade for this exam will be zero.

August 11, 2016
Kyiv

## Questions 1-3

Refer to the following table to answer questions 1-3.
Consider an economy that produces three goods:

|  | Quantity |  | Price |  |
| :--- | :---: | :---: | :---: | :---: |
| Product | 2012 | 2013 | 2012 | 2013 |
| A | 10 | 12 | $\$ 5$ | $\$ 6$ |
| B | 20 | 20 | $\$ 1$ | $\$ 1$ |
| C | 5 | 4 | $\$ 10$ | $\$ 12$ |

## Question 1

Nominal GDP growth rate between 2012 and 2013 is
A. $5 \%$
B. $10 \%$
C. $17 \%$
D. $20 \%$
E. None of the above answers is correct.

## Question 2

Real GDP growth rate between 2012 (base year) and 2013 is
A. $0 \%$
B. $5 \%$
C. $17 \%$
D. $20 \%$
E. None of the above answers is correct

## Question 3

The the GDP deflator in 2013 (2012 is he base year) is approximately
A. $5 \%$
B. $10 \%$
C. $17 \%$
D. $20 \%$
E. None of the above answers is correct.

## Question 4

Assume that equilibrium GDP is $\$ 4,000$ billion and potential GDP is $\$ 5,000$ billion. The marginal propensity to consume is $4 / 5(0.8)$. By how much and in what direction should government purchases be changed for the economy to reach its potential GDP level?
A. increase by $\$ 1,000$ billion
B. increase by $\$ 100$ billion
C. decrease by $\$ 1,000$ billion
D. increase by $\$ 200$ billion

## Question 5

Using the numbers in the previous question, by how much should taxes be changed?
A. increased by $\$ 1,000$ billion
B. decreased by $\$ 200$ billion
C. decreased by $\$ 1,000$ billion
D. decreased by $\$ 250$ billion

## Question 6

Assume that the National Bank of Ukraine increases the monetary base by UAH1 billion when the actual reserve-to-deposit ratio of the banking system is $1 / 7$. As a result, the money supply will:
A. increase by \$UAH billion
B. increase by UAH7 billion
C. decrease by UAH1 billion
D. increase by UAH143 million

## Question 7

If autonomous consumption equals $\$ 200$ billion, the marginal propensity to consume (MPC) is 0.75 , private-sector investment equals $\$ 150$ billion, government purchases equal $\$ 60$ billion, net taxes equal $\$ 160$, and net exports equal minus $\$ 30$ billion, the aggregate demand equation is
A. $\mathrm{AD}=\$ 540$ billion +.75 Y
B. $\mathrm{AD}=\$ 550$ billion +.25 Y
C. $\mathrm{AD}=\$ 505$ billion +.75 Y
D. $\mathrm{AD}=\$ 260$ billion +.75 Y
E. $\mathrm{AD}=\$ 600$ billion +.25 Y

## Question 8

Suppose a Ukrainian firm imports $\$ 1,000$ worth of bananas and sells them for $\$ 2,000$. The effect on GDP would be
A. to decrease the value of GDP by $\$ 3,000$.
B. to increase the value of GDP by $\$ 3,000$.
C. to increase the value of GDP by $\$ 2,000$.
D. to increase the value of GDP by $\$ 1,000$.
E. no effect on GDP since the bananas were produced outside Ukraine.

## Question 9

One of the central assumptions underlying the Laffer curve is that
A. tax revenue is maximized at a tax rate of $100 \%$
B. tax revenue always increases with increases in the tax rate
C. tax revenue is maximized at a tax rate of $50 \%$
D. a cut in the tax rate may increase tax revenue

## Question 10

According to the equation of exchange, if real output and the money supply stay the same and the price level increases:
A. The velocity of money has to increase.
B. The velocity of money has to decrease.
C. The real GDP had to rise.
D. Nominal GDP remains constant.

## Question 11

Which of the following is NOT true for the crowding-out effect?
A. Government budget deficits increase interest rates, which reduces investment spending.
B. Crowding out reduces the ability of fiscal policy to fight a recession.
C. If the government spends more on education, households may be forced to spend less on new homes.
D. Crowding out occurs especially when the economy is in deep recession and people are not spending all the available money.

## Question 12



Refer to figure above. The monopolist's maximum profit
A. is $\$ 800$.
B. is $\$ 1,000$.
C. is $\$ 1,250$.
D. cannot be determined from the diagram.

## Question 13

Assume that rented DVDs and movies shown in theaters are substitutes. Rented DVDs and plasma TVs are complements. Plasma TVs and movies shown in theaters are normal goods. Most plasma TVs sold in Ukraine are imported from China. If Ukrainian government reduces the number of plasma TVs that can be imported into Ukraine, ceteris paribus, what would happen?
A. The price of plasma TVs and the rental price of DVDs would increase.
B. The price of plasma TVs and the rental price of DVDs would decrease.
C. The price of plasma TVs would decrease and the rental price of DVDs would increase.
D. The price of plasma TVs would increase and the rental price of DVDs would decrease.

## Question 14

A new fertilizer which greatly improves the wheat crop yield is being widely used by wheat farmers. You accurately predict that this
A. will shift the supply curve of wheat to the right, the equilibrium price of wheat will increase, and the demand for wheat will fall.
B. will shift the supply curve of wheat to the right, the equilibrium price of wheat will decrease, and the quantity demanded of wheat will increase.
C. will shift the supply curve of wheat to the left, the equilibrium price of wheat will increase, and the quantity demanded of wheat will decrease.
D. will shift the supply curve of wheat to the left, the equilibrium price of wheat will increase, and the demand for wheat will fall.

## Question 15

If your tuition is $\$ 2,000$ this semester, your books cost $\$ 400$, you can only work 10 rather than 40 hours per week during the 15 weeks you are taking classes and you make $\$ 12$ per hour, and your room and board is $\$ 4,000$ this semester, then your opportunity cost of attending university this semester is
A. $\$ 2,400$.
B. $\$ 2,760$.
C. $\$ 7,800$.
D. $\$ 11,800$.

## Question 16

When the price of fresh fish increases $10 \%$, quantity demanded decreases $5 \%$. The price elasticity of demand for fresh fish is $\qquad$ and total revenue from fresh fish sales will $\qquad$ .
A. inelastic; increase
B. inelastic; decrease
C. elastic; decrease
D. elastic; increase

## Question 17

Olga is spending her entire income on goods X and Y . Her marginal utility from the last unit of X is 100 and the marginal utility from the last unit of $Y$ that she consumes is 50 . Olga's utility is only maximized if
A. the prices of X and Y are the same.
B. the price of good X is twice that of good Y .
C. the price of good Y is twice that of good X .
D. We cannot determine whether Ellie is maximizing her utility.

## Question 18

In the long run, a firm
A. can shut down, but it cannot exit the industry.
B. has no fixed factors of production.
C. can vary all inputs, but it cannot change the mix of inputs it uses.
D. must make positive economic profits.

## Question 19

Marginal cost is $\qquad$ average variable cost when $\qquad$ .
A. equal to; average total cost is minimized
B. less than; total cost is maximized
C. greater than; average fixed cost is minimized
D. equal to; average variable cost is minimized.

## Question 20

Assume Dell Computer Company operates in a perfectly competitive market producing 5,000 computers per day. At this output level, price equals this firm's marginal cost. Assuming price exceeds average variable cost, to maximize profits Dell should
A. make no adjustments as they are already maximizing their profits.
B. increase their output.
C. decrease their output.
D. stop producing since it is earning a loss.

