Instructions:

This is the on-line Multiple Choice Quiz for Chapter 7. Please do the following:

Step 1: Go to the special codes section on your score sheet

- Write your section number (4) under the letter K. Also fill out the appropriate bubble corresponding to your section number in column K.
- Go to the columns O and P. Enter for this chapter, 0 in the O column, and 7 in the P column. Also fill out the appropriate bubbles below in columns O and P.

Step 2: Enter your university identification number using numbers and corresponding bubbles.

Step 3: Enter your name, using letters and corresponding bubbles.

Step 4: Answer all 35 questions.

Step 5: Check the important dates link on the class home page for the availability and closing dates for the successive on-line multiple choice quizzes.

Step 6: Hand in your score sheets in class, to your TA’s or to myself, in class, or outside my office, Heady Hall 281, no later than the posted closing date and hour (5 p.m.)

We will use the following grading scale:

A = 35, 34, 33, 32, 31, 30
B = 29, 28, 27, 26, 25, 24
C = 23, 22, 21, 20, 19, 18
D = 17, 16, 15, 14, 13, 12
F = less than 12

Note: All MC quizzes will be discussed in detail in class prior to the posted Friday 5 p.m. closing date and hour. Bring your printed test and score sheet to that class session for that purpose.

Reminder: do not forget to take the Chapter 7 on line Aplia quiz on time, i.e. by 5 p.m. Fridays.
MULTIPLE CHOICE. Choose the one alternative that best completes the statement or answers the question.

1) The production function shows how ________ varies with ________.
   A) labor input; capital input   B) leisure time; labor input
   C) real GDP; labor input       D) labor input; leisure time

2) In the above figure, which of the following will create a movement from point a to point b?
   A) learning-by-doing            B) a decrease in leisure time
   C) an increase in physical capital D) an increase in human capital

3) In the above figure, suppose the country of Laborious is operating at point b. If the country wanted to move to point e, it could
   A) increase the amount of human capital used. B) increase the level and quality of education.
   C) increase the amount of physical capital used. D) All of the above answers are correct.

4) By using more capital to produce goods and services,
   A) labor productivity increases.
   B) human capital increases.
   C) there is a movement upward along the production function.
   D) there is a movement downward along the production function.

5) Between 1981 and 2001, the U.S. production function shifted upward for all of the following reasons EXCEPT
   A) firms invested in new plant and equipment.
   B) businesses found new uses for personal computers and the internet.
   C) the labor force participation of women increased.
   D) the educational attainment of workers increased.
6) The quantity of goods and services that an hour of labor earns is defined as the
   A) marginal product of labor.          B) supply of labor.
   C) real wage rate.                   D) money wage rate.

7) Which of the following is TRUE regarding the real wage rate? The real wage rate
   I. equals the 100 x (money wage)/(price level).
   II. measures the quantity of goods and services an hour's work can buy.
   A) only I                           B) neither I nor II
   C) both I and II                   D) only II

8) The quantity of labor demanded depends on
   A) only the money wage.              B) only the price level.
   C) the real wage.                   D) None of the above answers are correct.

9) When a soda factory increases its employment by one hour, output increases by 10 bottles. Workers are paid
   $5.00 per hour and soda sells for 50 cents a bottle. Which of the following statements is FALSE?
   A) If hourly wages increase to $5.50, the quantity of labor demanded will increase.
   B) The real wage rate is ten bottles of soda.
   C) If the price of soda increases to 55 cents a bottle, the quantity of labor demanded will increase.
   D) The marginal product of labor is ten bottles of soda.

10) Which of the following will shift the labor demand curve rightward?
    I. a decrease in labor productivity
    II. an increase in technology that increases the marginal product of labor
    III. an increase in the supply of labor
    A) I only                       B) II only
    C) I and III                  D) I, II and III

11) The marginal product curve is ______ which reflects ________.
    A) upward sloping; increasing opportunity costs as employment decreases
    B) downward sloping; increasing opportunity costs as employment decreases
    C) upward sloping; diminishing returns as employment increases
    D) downward sloping; diminishing returns as employment increases
12) In the above figure, for a movement from point b to point c, the marginal product of labor equals
   A) $200.  
   B) $150.  
   C) $75.  
   D) 5,000,000 hours.

13) The supply of labor curve
   A) shows how much labor workers are willing to supply at various real wage rates.
   B) is independent of the wage rate.
   C) is usually vertical.
   D) has a negative slope.

14) People base their labor supply on the ________ because they care about ________.
   A) money wage; a surplus of labor
   B) real wage; what their earnings will buy
   C) real wage; the equality of money wages and the price level
   D) money wage; the amount of labor firms demand
15) In the above figure, which of the following might have shifted the demand curve for labor from $L_D_0$ to $L_D_1$?

A) Workers' human capital fell.  
B) The population grew.  
C) The capital stock decreased.  
D) Labor productivity increased.

16) As a result of the rightward shift in the demand curve for labor from $L_D_0$ to $L_D_1$, the equilibrium level of employment _________ and potential GDP _________.

A) increases; increases  
B) decreases; decreases  
C) decreases; increases  
D) increases; decreases
17) In the above figure, which of the following is TRUE?
   A) A minimum wage of $10 per hour will cause less labor to be hired.
   B) As the real wage rate rises, the labor supply curve shifts leftwards.
   C) As the real wage rate falls, the labor demand curve shifts rightward.
   D) An increase in capital would increase the wage rate.

18) In the above figure, which of the following would be a reason why the wage rate falls to $10 per hour?
   A) The quantity of human capital increased.
   B) The nation's capital stock increased.
   C) The population grew.
   D) There were advances in technology.

19) In the United States, over the last 15 years, labor has become ________ causing firms to ________.
   A) less productive; demand more labor
   B) more productive; demand more labor
   C) more productive; demand less labor
   D) less productive; pay higher wages to get more productive workers

20) As the price level increases and there is a movement along the long-run aggregate supply curve, the
   A) money wage rate decreases.
   B) money wage rate stays constant.
   C) real wage rate decreases.
   D) real wage rate stays constant.

21) When the economy is at a point on its short-run aggregate supply curve above potential GDP, the real wage rate
    A) is above the full-employment equilibrium real wage rate.
    B) can be either above or below the full-employment equilibrium real wage rate.
    C) is equal to the full-employment equilibrium real wage rate.
    D) is below the full-employment equilibrium real wage rate.
22) Moving upward along the short-run aggregate supply curve, the
   A) money wage rate is rising.  B) money wage rate is falling.
   C) real wage rate is falling.  D) None of the above answers is correct.

23) As the price level rises, the ______ wage rate remains constant moving along the short-run aggregate
    supply curve and the ______ wage rate remains constant moving along the long-run aggregate supply
    curve.
   A) money; real  B) money; money  C) real; money  D) real; real

24) Which of the following is (are) reasons why unemployment always exists?
   I. job search
   II. job rationing
   A) Only II is correct.  B) Neither I nor II is correct.
   C) Both I and II are correct.  D) Only I is correct.

25) Suppose the amount of job search increases. This event could be a result of
   A) a decrease in the real wage.
   B) the natural rate of unemployment being greater than the unemployment rate.
   C) an increase in unemployment insurance payments.
   D) None of the above answers are correct.

26) Which of the following can result in job rationing?
   I. efficiency wages
   II. the minimum wage
   A) only I  B) neither I nor II  C) both I and II  D) only II

27) Suppose the equilibrium real wage is $10 per hour. If the current real wage is $15 per hour,
   A) the labor market is out of equilibrium.
   B) the unemployment rate will be greater than the natural rate of unemployment.
   C) job rationing is definitely not occurring.
   D) Both answers A and B are correct.

28) An efficiency wage is a wage
   A) such that the quantity of labor demanded exceeds the quantity of labor supplied.
   B) at which there are no discouraged workers.
   C) that reduces unemployment to zero.
   D) that is the equilibrium wage only when the economy is producing at its potential GDP.

29) Efficiency wages
   A) increase unemployment.  B) lead to lower real wages.
   C) decrease productivity.  D) are created by job search.
30) Microsoft might pay its workers $50 per hour when the equilibrium real wage is $35 per hour. Microsoft could be paying this higher wage because
   A) it believes it can attract more productive workers.
   B) it believes its workers will work harder to avoid being fired.
   C) it thinks the equilibrium wage is too low.
   D) Both answers A and B are correct.

31) Suppose the equilibrium real wage equals $20 per hour, but the current real wage equals $35 per hour. This difference could be a result of
   A) high unemployment benefits.       B) an increase in labor supply.
   C) firms’ paying an efficiency wage.  D) an increase in the natural rate of unemployment.

32) In the above figure, the wage rate paid to workers would
   A) fall if a minimum wage of $10 an hour is imposed.
   B) be higher than $15 per hour if the population increases.
   C) be higher than $15 per hour if firms use efficiency wages.
   D) depend only on how much firms are willing to pay.

33) Which of the following is an example of an efficiency wage?
   A) paying a wage higher than the equilibrium wage in order to decrease labor turnover
   B) paying a wage above the minimum wage
   C) paying salespeople commissions
   D) paying some factory workers per unit of output they produce

34) A minimum wage is set by ________ and causes a ________ of labor.
   A) firms; surplus               B) unions; surplus
   C) unions; shortage             D) the government; surplus
35) Suppose that the equilibrium real wage rate is $6 per hour at which 100 million hours of labor are employed. If an $8 minimum wage is imposed,
   A) less than 100 million hours will be employed.
   B) there will be no effects on the current labor market.
   C) firms will lower the equilibrium wage rate they pay.
   D) more than 100 million hours will be employed.