國立政治大學 104 學年度轉學生招生考試試題

考試科目	微積分	系別	經濟學系二年級	考試時間	7月10日(五) 第四節

注意事項:

(1) 不可使用計算機。

(2) 請依題號順序作答, 並於答案卷中清楚標示各題與各小題題號。

(3) 答題若過程錯誤 (或沒有過程) 但答案正確, 將以「零分」計算。

(4) $\ln(x) = \log_e x$.

1. (Total: 20%) Find the following limits:
   (*Hint*: For (1) and (2), use the lemma that $(1+h)^n \geq 1 + nh + \frac{n(n-1)}{2}h^2$, where h is a positive number and n a positive integer.)

   (1) $\lim_{n\to\infty} \alpha^n$.

   (2) $\lim_{n\to\infty} \sqrt[n]{n}$.

   (3) $\lim_{x\to 0} \frac{\sin(x)}{x}$.

   (4) $\lim_{x\to 0} \frac{e^{2x}-1}{\ln(1+x)}$.

2. (Total: 20%) Find the following derivatives:

   (1) $\frac{d(x/(x^2+1))}{dx}$.

   (2) $\frac{d\sqrt{1-e^x}}{dx}$.

   (3) $\frac{d\ln(x^2+1)}{dx}$.

   (4) $\frac{d\ln(\ln(x))}{dx}$.

3. (Total: 12%) Taylor's Theroem: If a function $f(t)$ has continuous derivatives up to the $(n+1)$th order on a closed interval containing the two points a and b, then

$$f(b) = f(a) + (b-a)f'(a) + \cdots + \frac{(b-a)^n}{n!}f^{(n)}(a) + R_n,$$

   where $R_n = \frac{1}{n!}\int_a^b (b-t)^n f^{(n+1)}(t)dt$. By using this theorem,

   (1) Find e^x.

   (2) Find $\sin(x)$.

備註	一、作答於試題上者，不予計分。 二、試題請隨卷繳交。

考試科目	微積分	系別	經濟學系二年級	考試時間	7月10日(五) 第四節

4. (Total: 18%) Over the xy−plane,

   (1) If the function is defined as

$$f(x,y)=\begin{cases} y^2e^{-y(x+1)}, & x\geq 0, y\geq 0;\\ 0, & \text{elsewhere.}\end{cases}$$

   a. Find $\int_{-\infty}^{\infty} f(x,y)dy$.

   b. Find $\int_{-\infty}^{\infty} f(x,y)dx$.

   (2) If the function is defined as

$$f(x,y)=\begin{cases} 1/x, & 0\leq y\leq x\leq 1;\\ 0, & \text{elsewhere.}\end{cases}$$

   Find $\int_{-\infty}^{v}\int_{-\infty}^{u} f(x,y)dxdy$, where $0\leq v\leq u\leq 1$.

5. (Total: 15%) For any real number $r>0$, the gamma function of r

$$\Gamma(r)=\int_0^{\infty} y^{r-1}e^{-y}dy.$$

   (1) $\Gamma(1)=?$

   (2) Show that $\Gamma(r)=(r-1)\Gamma(r-1)$.

   (3) If r is an integer, then $\Gamma(r)=(r-1)!$.

6. (Total: 15%) Find the integrals:

   (1) $\int \ln(x)dx$.

   (2) $\int \frac{1}{x}\ln(x)dx$.

   (3) $\int \sin^2(x)dx$.

備註	一、作答於試題上者，不予計分。 二、試題請隨卷繳交。

國立政治大學 104 學年度轉學生招生考試試題

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

選擇題（單選）：總共 100 題，每題 1 分，總分共 100 分。

選擇題請在答案卡上作答，否則不予計分。

1. Economics is the study of:
A. how to make money.
B. how to allocate resources to satisfy wants and needs.
C. capitalism.
D. how to make workers more productive and firms more profitable.
E. markets.

2. The cost of a trade-off is known as the ________ of that decision.
A. marginal cost
B. net cost
C. opportunity cost
D. comparative cost
E. explicit cost

3. Economists believe that optimal decisions are made up to the point where:
A. marginal benefit is zero.
B. marginal cost is zero.
C. marginal benefits are greater than marginal costs.
D. marginal costs are greater than marginal benefits.
E. marginal benefits are equal to marginal costs.

4. Which of the following is a normative statement?
A. The sky is blue.
B. The sky is green with pink polka dots.
C. Points on the production possibilities frontier (PPF) are efficient.
D. Points outside the PPF are unattainable with current resources.
E. We should strive to push the PPF outward.

5. Ceteris paribus means:
A. in sets of two.
B. constant opportunity cost.
C. other things being equal.
D. there is no reason to argue about people's tastes.

6. Which of the following is NOT an assumption that economists make when developing a production

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

possibilities frontier (PPF)?

A. We live in a world with only two goods.

B. There are no increases in technology.

C. There is no change in available resources.

D. Society will always be producing somewhere on the PPF.

E. There are no decreases in technology.

7. The demand curve for a good will shift to the right if, holding all else constant,

A. consumers expect future prices to decrease.

B. an input cost of the item goes up.

C. consumers expect future prices to increase.

D. the price of the good goes down.

E. the price of a substitute good goes down.

8. Which following change in the coffee market would shift the supply curve to the right?

A. A study finds that drinking coffee leads to higher grades.

B. The wage for employees in the coffee business decreases.

C. The income in the economy increases.

D. Firms expect the price of coffee to increase in the future.

E. Fifty Starbucks coffee shops close down.

9. In the first few months of 2012, the price of gasoline increased by approximately 15%. Because of this increase, we would expect the _________ curve in the market for hybrid cars to _________.

A. demand; shift to the right

B. demand; make no movement

C. supply; shift to the left

D. demand; shift to the left

E. supply; shift to the right

10. What would you expect to happen to the price of bagels if the price of flour decreased and the price of cream cheese decreased?

A. The equilibrium price will go up and the equilibrium quantity will go up.

B. The equilibrium price of bagels will be indeterminate and the equilibrium quantity will go up.

C. The equilibrium price will be indeterminate and the equilibrium quantity will go down.

D. The equilibrium price will go up and the equilibrium quantity will be indeterminate.

E. The equilibrium price will go down and the equilibrium quantity will be indeterminate.

考試科目	經濟學 A	系 別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

11. The Sunny Softball league found that, when it changed its ticket prices from $10 to $5, there was a more than proportional but not infinite increase in attendance. The price elasticity of demand is:
A. perfectly inelastic.
B. inelastic.
C. elastic.
D. perfectly elastic.
E. unitary elastic.

12. As you move right along a demand curve, the price elasticity of demand:
A. becomes more inelastic.
B. becomes more elastic.
C. does not change.
D. becomes infinite.
E. moves closer to zero.

13. When Nina decreases her price of lipstick from $7 to $5, she finds that her sales increase from 6 to 7. She faces ___________ demand for her product, and this price change will ___________ her total revenue.
A. elastic; raise
B. inelastic; lower
C. unitary elastic; not change
D. perfectly elastic; raise
E. perfectly inelastic; lower

14. What good is most likely to have an income elasticity of demand equal to 8?
A. a doctor's visit
B. toilet paper
C. used clothing
D. a five-star hotel
E. college coursework

15. We would expect to see a positive cross-price elasticity between:
A. peanut butter and jelly.
B. ice cream and frozen yogurt.
C. basketballs and steak.
D. sneakers and socks.
E. computers and iPods.

考試科目	經濟學A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

16. What is the incentive to create a black market when a binding price ceiling exists?
A. A black market emerges because sellers have a surplus that they need to sell.
B. A black market emerges because sellers want a market where they can sell lower-quality products.
C. A black market emerges because sellers want a market where they can sell higher-quality products at higher prices.
D. A black market does not emerge because sellers are content to sell at the lower price.
E. A black market emerges because buyers who have a low opportunity cost are seeking out the product.

17. Consider the market for socks. The current price of a pair of plain white socks is $5.00. Two consumers, Jeff and Samir, are willing to pay $7.25 and $8.00, respectively, for a pair of plain white socks. Two sock manufacturers are willing to sell plain white socks for as little as $4.00 and $4.15 per pair. What is the total producer surplus in this market?
A. $0.15
B. $8.15
C. $0.85
D. $1.00
E. $1.85

18. A market has reached an efficient outcome when:
A. producers are able to produce and sell as much as they like.
B. total surplus is minimized.
C. producer surplus is greater than consumer surplus.
D. consumers are able to purchase as much as they like.
E. total surplus is maximized.

19. Which of the following statements is concerned with equity rather than efficiency?
A. Almost all taxes create some amount of deadweight loss.
B. Excise taxes tend to raise prices for consumers and reduce sales for firms.
C. Tax rates on the wealthy are too low and should be raised.
D. The incidence of a tax does not depend on who actually pays it.
E. Taxes generate revenues that governments spend on services.

20. In most cases, taxes reduce economic efficiency because:
A. they lower prices for consumers and cause firms to suffer.
B. they increase firms' profits at the expense of consumers.
C. taxes are perceived as unfair by some taxpayers.
D. the government often spends tax revenues on programs that some voters don't like.

考試科目	經濟學 A	系 別	經濟學系二年級	考試時間	7月10日(五) 第二 節

E. they reduce consumer surplus and producer surplus.

21. The incidence of a tax reflects:
A. who pays the tax out of pocket.
B. how much tax revenue the tax generates.
C. who bears the burden of the tax.
D. how the tax revenue from the tax is spent.
E. government efficiency in providing goods and services.

22. Assume that a $0.25/gallon tax on milk causes a loss of $250 million in consumer and producer surplus and creates a deadweight loss of $45 million. From this information, we know that the tax revenue from the tax is:
A. $250 million.
B. $45 million.
C. $205 million.
D. $295 million.
E. $75 million.

23. The amount you pay for insurance on your car is an example of a(n):
A. internal cost.
B. social cost.
C. external cost.
D. third-party cost.
E. public-good cost.

24. Consider a market with a negative externality. The market will tend to ____________ the good because the market participants tend to ignore the ___________ of their decision.
A. overproduce; external benefit
B. under-produce; external benefit
C. overproduce; external cost
D. under-produce; external cost
E. overproduce; internal benefit

25. Which of the following is a benefit of internalizing a negative externality?
A. All pollution is eliminated.
B. More output is produced.
C. The deadweight loss is eliminated.

考 試 科 目	經濟學 A	系 別	經濟學系二年級	考 試 時 間	7 月 10 日(五) 第二 節

D. The good is sold for a lower price.
E. Output increases and prices are lower.

26. Congestion charges effectively decrease the number of cars on the road. This is an example of:
A. the law of supply.
B. the public-good problem.
C. the free-rider problem.
D. the common-resource problem.
E. internalizing the externality.

27. Externalities exist because:
A. owners of private property have an incentive to maintain their property.
B. owners of private property have little incentive to protect their property.
C. owners of private property are not able to trade with others.
D. property rights are not clearly defined.
E. there is too much private ownership of property.

28. Driving in the city is an example of a good that is:
A. excludable.
B. rival.
C. nonexcludable and rival.
D. nonrival.
E. excludable and nonrival.

29. Club goods are:
A. nonrival, like public goods, and excludable, like private goods.
B. nonrival, like private goods, and excludable, like common-resource goods.
C. nonrival, like common-resource goods, and excludable, like public goods.
D. rival, like private goods, and nonexcludable, like public goods.
E. rival, like common-resource goods, and nonexcludable, like private goods.

30. A firm's accounting profit is always greater than its economic profit because:
A. economic profit considers implicit costs, which accounting profit does not.
B. accounting profit considers explicit costs, which economic profit does not.
C. economic profit is always zero, no matter what kind of firm it is.
D. accounting profit considers implicit costs, which economic profit does not.
E. accounting profit is always positive, no matter what kind of firm it is.

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

31. Assume that a firm hires an additional employee. If the marginal product for that employee is greater than for the previous employee hired, it must be because:
A. the marginal product of labor is diminishing.
B. all workers are paid the same wage.
C. the workers all perform the exact same set of tasks.
D. there are gains from specialization.
E. all workers are not paid the same wage.

32. In the short run, average total costs and average variable costs converge as output increases because:
A. marginal cost is below average total cost.
B. marginal cost is below average fixed cost.
C. average fixed costs continually increase.
D. average fixed costs continually decrease.
E. total cost continually increases.

33. When the average variable cost curve is upward-sloping, what must be true about the marginal cost curve?
A. It is U-shaped.
B. It is above the average variable cost curve.
C. It is upward-sloping.
D. It is below the average variable cost curve.
E. It is a straight line.

34. How will a firm know if it has grown too large, that is, when it has exceeded its minimum efficient scale of production?
A. Its long-run average costs begin to decrease.
B. Its long-run average costs begin to increase.
C. Its market power begins to diminish.
D. The number of other firms in the market rises.
E. All of its workers quit and go to work for the competition.

35. In competitive markets:
A. firms set the prices for their products with little concern for the consumer.
B. firms are considered to be price makers.
C. firms are at the mercy of market forces.
D. the individual firms are much stronger than the market forces are.
E. the market forces set the quantity in the market but not the prices.

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

36. Which characteristic of competitive markets is mainly responsible for firms making zero economic profits in the long run?
A. many buyers
B. many sellers
C. similar goods
D. differentiated goods
E. easy entry into and exit from the market

37. If the market price is $15 and marginal cost is represented by the equation $2 \times Q$, where Q is in thousands of units, what is the profit-maximizing quantity?
A. 15,000
B. 8,000
C. 7,000
D. 7,500
E. 30,000

38. A natural monopoly:
A. exists when many sellers experience lower average total costs than potential competitors do.
B. exists when a firm has sole ownership of a natural resource.
C. is an example of a government-created barrier.
D. is needed to make a profit in the long run.
E. exists when a single seller experiences lower average total costs than any potential competitor.

39. The demand curve for the product of a firm in a competitive market is ____________, and the demand curve for the product of a monopolist is ____________.
A. perfectly inelastic; downward-sloping
B. horizontal; perfectly inelastic
C. downward-sloping; perfectly elastic
D. downward-sloping; horizontal
E. perfectly elastic; downward-sloping

40. The equation of a firm's marginal revenue curve is estimated to be $P = 50 - Q$ (quantity), and the equations of their marginal cost curve is estimated to be $P = 10 + 3Q$. The profit-maximizing price for this firm is:
A. $5.
B. $10.
C. $15.

D. $50.
E. $40.

41. When resources are used to secure monopoly rights through the political process:
A. firms are rent-seeking.
B. consumers are profit-maximizing.
C. total surplus is maximized.
D. the government is deregulating.
E. prices decrease.

42. Which of the following best describes price discrimination?
A. charging different prices to different people and the prices are perceived as unfair and harmful
B. a firm selling the same good at more than one price to different groups of customers
C. when differences in cost are reflected by differences in price
D. commission of an act that is always illegal and not beneficial to buyers or sellers
E. a practice available only to competitive, price-taking firms

43. Suppose the market for golf clubs has moved from a perfectly competitive market to one that is completely dominated by firms practicing perfect price discrimination. Which of the following statements is true about the change in welfare?
A. The change creates a deadweight loss.
B. Society's total welfare is zero after the change.
C. There is a decrease in deadweight loss accompanied by a decrease in producer surplus.
D. Some surplus has been lost to society, but consumers are better off overall.
E. All of the surplus previously enjoyed by consumers has been shifted to producers.

44. Which of the following statements best describes firms under monopolistic competition?
A. There is little price or quality competition.
B. The firms compete using quality, location, and style.
C. Firms do not compete using advertising.
D. There is little competition between firms.
E. There are a few firms that collude to set the highest price.

45. The demand curve for a monopolistically competitive firm is downward sloping because of:
A. high barriers to entry.
B. product differentiation.
C. the lack of firms in the industry.

考試科目	經濟學A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

D. government regulation.
E. identical cost curves for each firm.

46. When a market is characterized by mutual interdependence:
A. one firm's pricing decision does not affect the market share of any other firm.
B. one firm's quantity decision does not affect the market share of any other firm.
C. all firms always act in unison to produce the monopoly quantity.
D. the actions of one firm have an impact on the price and output of its competitors.
E. the actions of one firm have no impact on the price and output decisions of its competitors.

47. Economists use _________ to better understand what might happen in situations where strategic interactions are involved.
A. complexity theory
B. strategic theory
C. competitive theory
D. noncompetitive theory
E. game theory

48. When customers face significant switching costs, the:
A. demand for the existing product becomes more inelastic.
B. supply for the existing product becomes more inelastic.
C. demand for the existing product is perfectly inelastic.
D. supply for the existing product is perfectly inelastic.
E. demand for the existing product becomes neither perfectly elastic nor perfectly inelastic.

49. When Josh's wage rises and he decides to work more hours, we know that the _________ effect has dominated the _________ effect.
A. substitution; income
B. labor; leisure
C. income; substitution
D. leisure; labor
E. substitution; leisure

50. The substitution effect and the real-income effect are two effects that happen when:
A. marginal utility increases.
B. marginal utility decreases.
C. total utility decreases.

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

D. a price changes.
E. total utility increases.

51. GDP is a good, but not the best, measure of:
A. the percentage change in the overall level of prices.
B. income inequality.
C. changes in average living standards.
D. environmental quality.
E. the cost of living.

52. The business cycle measures:
A. fluctuations in the long-run trend growth rate of GDP.
B. fluctuations in the profit of businesses.
C. fluctuations in consumption.
D. short-run fluctuations in economic activity.
E. fluctuations in the average tax rate paid by businesses.

53. Farmer Bill grows wheat and sells it to the miller for $50,000. The miller turns it into flour and sells it to the bakery for $75,000. The bakery uses the flour in the bread that it sells to people for $90,000. The total contribution to GDP is:
A. $90,000.
B. $75,000.
C. $50,000.
D. $25,000.
E. $215,000.

54. Which of the following lists the three types of unemployment?
A. frictional, structural, and practical
B. practical, structural, and cyclical
C. frictional, unavailable, and structural
D. cyclical, practical, and unavailable
E. frictional, structural, and cyclical

55. Which of the following people would be officially considered unemployed?
A. Mitchell, who is a full-time student working part-time at the bookstore
B. Janice, who is actively seeking a full-time job while currently working at a part-time job
C. Jade, who has stopped looking for a job because she feels there are no jobs available for her

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

D. Jenna, who just graduated college and is searching for a job that fits her graphic-design skills

E. Ralph, who is a stay-at-home father and is not currently looking for a job

56. When actual unemployment is less than its natural rate:

A. the economy is expanding beyond its long-run capabilities.

B. the economy is producing within its long-run capabilities.

C. the numbers must be wrong because the actual unemployment rate can never be less than the natural rate.

D. the economy is in a recession.

E. the economy must be experiencing high inflation.

57. Individuals who are not working but are willing to work and who have looked for a job in the past 12 months but have not sought employment in the past 4 weeks are defined as:

A. unemployed.

B. employed.

C. unhappy workers.

D. discouraged workers.

E. retired.

58. Suppose a basket of goods and services has been selected to calculate the consumer price index (CPI) and 2002 has been selected as the base year. In 2002, the basket's cost was \$600; in 2004, the basket's cost was \$650; and in 2006, the basket's cost was \$700. The value of the CPI in 2004 was (round to one decimal place):

A. 92.3.

B. 106.3.

C. 108.3.

D. 152.0.

E. more than 155.0.

59. If the goods producers buy change dramatically between years, then:

A. this would be reflected in both the consumer price index (CPI) and the gross domestic product (GDP) deflator.

B. this would not be reflected in either the CPI or the GDP deflator.

C. it would mean the market basket would be automatically updated to reflect the changes.

D. this would be reflected in the GDP deflator but not the CPI.

E. menu costs would fall.

60. If nominal income increases, then:

A. real income increases.

考試科目	經濟學A	系 別	經濟學系二年級	考試時間	7月10日(五) 第二 節

B. real income increases if the price index falls.
C. real income increases if the percent increase in price index rises by more the percent change in nominal income.
D. real income increases if you buy only the goods included in the consumer price index (CPI) and the majority of those goods get cheaper.
E. real income decreases.

61. The concept of the loanable funds market is:
A. similar to that of the grocery store—goods are sold and money is borrowed to pay for them.
B. the market by which lenders (savers) and borrowers exchange funds for earlier availability at a premium, which is represented by the interest rate.
C. similar to the notion of consumer and producer surplus where the interest rate represents either consumer or producer surplus depending on who is doing the borrowing.
D. the market by which borrowers (suppliers) and lenders (demanders) exchange funds for earlier availability at a premium, which is represented by the interest rate.
E. that the interest rate is determined by multiplying the risk premium by the coefficient of pure interest.

62. The real interest rate:
A. equals the nominal rate minus the prime rate.
B. increases as inflation increases, ceteris paribus.
C. is what you really pay if you borrow versus what you think you are paying.
D. equals the nominal rate plus the rate of inflation.
E. equals the nominal rate minus the rate of inflation.

63. An increase in the supply of loanable funds means:
A. borrowers want to borrow more at every interest rate.
B. savers want to borrow more at every interest rate.
C. borrowers want to borrow more at a specific interest rate.
D. savers want to save more at a specific interest rate.
E. savers want to save more at every interest rate.

64. A bond is:
A. the creation of a new security by combining otherwise separate loan agreements.
B. an ownership of a firm.
C. a security that represents a debt to be paid.
D. a market in which securities are traded after their first sale.
E. a private firm that accepts deposits and extends loans.

考試科目	經濟學A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

65. The risk that the borrower will not pay the face value of a bond on the maturity date is called the:
A. default risk.
B. maturity risk.
C. timing risk.
D. full-pay risk.
E. par value risk.

66. A higher bond rating directly translates into:
A. higher prices and higher interest rates on the firm's bonds.
B. higher prices and lower interest rates on the firm's bonds.
C. lower prices and lower interest rates on the firm's bonds.
D. lower prices and higher interest rates on the firm's bonds.
E. higher prices and higher default rates on the firm's bonds.

67. Economic growth equals the percent change in nominal gross domestic product (GDP) minus:
A. the percent change in prices and the rate of population growth.
B. the percent change in prices.
C. the rate of population growth.
D. the percent change in prices and the federal budget deficit.
E. the rate of population growth and the percent change in investment.

68. A firm's human capital would increase with:
A. a decrease in the number of employees.
B. new and improved equipment and machinery.
C. a larger facility.
D. on-the-job training.
E. fewer managers per worker.

69. Which of the following is an example of an institution that promotes economic growth?
A. private property rights
B. bartering as a means of trade
C. high barriers to international trade
D. constant war and conflict
E. collective property ownership

70. The early Solow model focused on:

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7 月 10 日(五) 第二節

A. the skill level of workers.
B. the labor supply.
C. government policy.
D. the availability of capital goods.
E. institutions.

71. When the marginal product of an input falls as the quantity of the input rises, this is known as:
A. diminishing marginal product.
B. diminishing output.
C. diminishing production.
D. decreasing returns to scale.
E. inverse marginal product.

72. An economy is in a steady state if:
A. depreciation is zero.
B. investment is zero.
C. net investment is positive.
D. capital and output are not changing.
E. there are diminishing returns.

73. Convergence is the idea that __________ will equalize across nations as they approach the steady state.
A. the level of education
B. the level of real gross domestic product (GDP)
C. the level of real GDP per capita
D. the level of environmental quality
E. political stability

74. Aggregate demand is determined by adding up the spending of:
A. domestic consumers who buy goods and services produced in the United States.
B. domestic consumers and firms that buy goods and services produced in the United States.
C. domestic and foreign consumers who buy goods and services produced in the United States.
D. domestic and foreign consumers and firms that buy goods and services produced in the United States.
E. consumers, firms, the government, and foreigners that buy goods and services produced in the country

75. An increase in the value of the dollar will __________ exports and __________ imports.
A. increase; increase
B. decrease; decrease

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

C. have no effect on; have no effect on
D. decrease; increase
E. increase; decrease

76. The long run in Macroeconomics is best defined as a period of time such that:
A. more than one year has passed.
B. more than five years have passed.
C. some prices have adjusted.
D. all prices have adjusted.
E. all firms are maximizing profit.

77. A technological advance leads to a shift in:
A. only short-run aggregate supply.
B. only long-run aggregate supply.
C. neither short-run nor long-run aggregate supply.
D. both short-run and long-run aggregate supply.
E. only aggregate demand.

78. If the current short-run equilibrium level of output is less than full employment output, we can then expect that in the long run:
A. the price level will fall.
B. the price level will rise.
C. aggregate demand will decrease.
D. aggregate demand will increase.
E. long-run aggregate supply will decrease.

79. Classical economists believe that:
A. prices are sticky.
B. the economy can adjust back to full employment on its own.
C. the short run is more significant than the long run.
D. aggregate demand is more significant than aggregate supply.
E. the economy needs help in moving back to full employment.

80. According to classical economists,:
A. the government will need to stimulate aggregate demand.
B. long-run aggregate supply is the primary source of economic growth.
C. prices are quite rigid and inflexible.

考試科目	經濟學 A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

D. unemployment will tend to persist over time.
E. long-run aggregate supply is irrelevant in determining growth.

81. When considering the basic operations of the macroeconomy, Keynesian economists argue that:
A. the economy does not need help in moving back to full employment.
B. prices are flexible.
C. the market tends toward stability and full employment.
D. savings is a drain on demand.
E. the long run is more significant than the short run.

82. Which of the following policy statements would a Keynesian economist tend to support?
A. The government should encourage savings as a means of promoting economic growth.
B. The government should never intervene in the economy.
C. The government should intervene in the economy to promote full employment.
D. The government should intervene in the economy only when aggregate supply changes.
E. The government should focus on long-run aggregate supply, not aggregate demand.

83. Fiscal policy is:
A. the use of the money supply to influence the economy.
B. actions taken by the Federal Reserve to influence the economy.
C. only used during times of recession.
D. only used during times of expansion.
E. the use of government spending and taxes to influence the economy.

84. Expansionary fiscal policy leads to:
A. decreases in budget deficits and the national debt during economic downturns.
B. contractionary fiscal policy the following year.
C. increases in budget deficits and the national debt during economic downturns.
D. increases in budget surpluses and decreases in the national debt during economic downturns.
E. contractionary monetary policy the following year.

85. If the unemployment rate falls below the natural rate of unemployment:
A. the government will want to conduct expansionary fiscal policy.
B. the Federal Reserve will want to conduct expansionary monetary policy.
C. the economy is in a recession.
D. there will be no worries about inflation.
E. the government will want to conduct contractionary fiscal policy.

考試科目	經濟學A	系別	經濟學系二年級	考試時間	7月10日(五) 第二節

86. If an initial increase in government spending of $100 billion leads to a total increase of $400 billion in income, the marginal propensity to consume in the economy is:

A. 0.4.
B. −0.8.
C. 0.5.
D. 0.75.
E. 0.8.

87. Complete crowding-out is when:

A. every dollar of government spending crowds out one dollar of tax revenue.
B. every dollar of government spending crowds out one dollar of private spending.
C. every dollar of private spending crowds out one dollar of government spending.
D. every dollar of private spending crowds out one dollar of tax revenue.
E. every dollar of tax revenue crowds out one dollar of government spending.

88. The Laffer curve is:

A. an assertion that increases in government spending and decreases in taxes are largely offset by increases in savings.
B. an illustration of the relationship between the price level and real output.
C. an illustration of the relationship between tax rates and tax revenues.
D. an illustration of the relationship between government spending and taxes.
E. an illustration of real gross domestic product (GDP) over time.

89. Money eliminated the need for the double coincidence of wants through its role as:

A. fiat money.
B. a unit of account.
C. a store of value.
D. a medium of exchange.
E. currency.

90. Which of the following is most liquid?

A. savings deposits
B. checking deposits
C. credit cards
D. small time deposits
E. money market mutual funds

考 試 科 目	經濟學 A	系 別	經濟學系二年級	考 試 時 間	7 月 10 日(五) 第二 節

91. ______________ is the phenomenon when one party that is protected from risk behaves differently than if it were fully exposed to the risk.
A. Moral hazard
B. Fractional reserve banking
C. Owner's equity
D. Simple deposit multiplier
E. Double coincidence of wants

92. According to the Fisher equation, if a bank extends a loan for 3% and the inflation rate ends up being 2%:
A. the nominal interest rate is 1%.
B. the real interest rate is 1%.
C. the nominal interest rate is -1%.
D. the real interest rate is -1%.
E. the nominal interest rate is 5%.

93. Monetary neutrality is:
A. when a central bank acts to increase the money supply.
B. when a central bank acts to decrease the money supply.
C. the short-run inverse relationship between inflation and unemployment rates.
D. the combination of high unemployment and high inflation.
E. the idea that the money supply does not affect real economic variables.

94. _________ indicates a short-run inverse relationship between inflation and unemployment rates.
A. Stagflation
B. Adaptive expectations theory
C. The Phillips curve
D. Lorenz Curve
E. Rational expectations theory

95. The combination of high unemployment rates and high inflation is called:
A. disinflation.
B. deflation.
C. monetary neutrality.
D. stagflation.
E. adaptive inflation.

96. A rich nation will trade with a poor nation (and vice versa) because the:

考 試 科 目	經濟學 A	系 別	經濟學系二年級	考 試 時 間	7 月 10 日(五) 第二 節

A. rich nation has a comparative advantage in all products.
B. poor nation has an absolute advantage in all products.
C. rich nation has an absolute advantage in all products.
D. poor nation has a comparative advantage in a product.
E. poor nation does not have any comparative advantage.

97. A quota:
A. imposes a tax on goods entering the country.
B. limits the quantity of goods leaving the country.
C. subsidizes the production of goods leaving the country.
D. limits the quantity of goods entering the country.
E. is a tax on imports.

98. The argument that calls for the trade protection of only newly developing industries is known as the _______________ argument.
A. autarky
B. infant industry
C. developing nation
D. predatory dumping
E. learning by doing

99. In the short run, _____________ would increase domestic aggregate demand in the context of the aggregate supply–aggregate demand model.
A. an increase in the value of the domestic currency against all foreign currencies
B. a depreciation of the domestic currency against all foreign currencies
C. an appreciation of the domestic currency against all foreign currencies
D. a depreciation of all foreign currencies against the domestic currency
E. either an increase or decrease in domestic government spending

100.Assume that a country currently has a trade surplus. If that country experiences an expansion in economic activity, what would we expect to happen to the trade surplus?
A. Nothing, because expansions do not impact the trade surplus.
B. Imports tend to be higher during this time, which decreases the trade surplus.
C. Exports tend to be lower during this time, which increases the trade surplus.
D. Exports tend to be higher during this time, which decreases the trade surplus.
E. Imports tend to be lower during this time, which increases the trade surplus.

備 註	一、作答於試題上者，不予計分。 二、試題請隨卷繳交。

國立政治大學 104 學年度轉學生招生考試試題

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

選擇題（單選）：總共 100 題，每題 1 分，總分共 100 分。請在答案卡上作答，否則不予計分。

1. The problem that economists consider is how an individual
A. actor's preferences are formed.
B. actor decides to allocate scarce resources among competing ends.
C. firm decides on means for influencing its buyers preferences.
D. firm grows.

2. An equilibrium is an outcome in which
A. all individuals are simultaneously optimizing.
B. constraints are no longer binding.
C. social gain is as large as possible.
D. the wants of all agents are fully satisfied.

3. The primary criterion used to analyze the desirability of outcomes in Economics is
A. sustainability
B. equity.
C. predictability.
D. efficiency.

4. Microeconomics is the branch of economics that deals with which of the following topics?
A. The behavior of individual consumers
B. Unemployment and interest rates
C. The behavior of individual firms and investors
D. (b) and (c)
E. (a) and (c)

5. Use the following statements to answer this question.

I. If the extent of a market is broader, it is less likely that firms in the market can influence the market price.
II. In determining whether two different products belong to the same market, it is necessary to know whether the two products can be used as substitutes for each other.

A. I and II are both false.
B. I is false, and II is true.
C. I is true, and II is false.
D. I and II are both true.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

6. Along any downward sloping straight-line demand curve:
A. both the price elasticity and slope vary.
B. the price elasticity varies, but the slope is constant.
C. the slope varies, but the price elasticity is constant.
D. both the price elasticity and slope are constant.

7. If Scout has an absolute advantage over Dill,
A. Scout has more money than Dill.
B. the problem of scarcity applies to Dill but not to Scout.
C. the problem of scarcity applies to Scout, but not to Dill.
D. Scout can accomplish more in a given period of time than can Dill.

8. In a two-person, two-good economy, the benefits of labor specialization will be larger when
A. one person has an absolute advantage in both goods.
B. neither person has an absolute advantage.
C. both persons have identical absolute advantages.
D. there is a large difference in the opportunity costs.

9. Consider the demand functions:
A) Qd = 250 - 2P
B) Qd = 300 - 3P
Qd is quantity demanded and P is price. Which of the demand functions reflects a higher level of consumer incomes?
A. A
B. B
C. A and B reflect the same consumer incomes.
D. more information is needed.

10. If the demand for orange juice is expressed as Q = 2000 - 500p, where Q is measured in gallons and p is measured in dollars, then at the price of $3, the demand curve
A. is elastic.
B. has a unitary elasticity.
C. is inelastic.
D. is perfectly inelastic.

11. If the price of marshmallow exceeds the marginal value that the consumer places on marshmallows, then
A. the consumer is at the optimum.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

B. the consumer's level of satisfaction would increase if he buys more marshmallows and less of other goods.
C. a surplus of marshmallows exists in the market.
D. the optimum contains fewer marshmallows than the consumer is currently buying.

12. Consider the ordinary and compensated demand curves for a normal good. If the price of the good falls, then
A. the ordinary demand curve will show the larger increase in quantity demanded.
B. the compensated demand curve will show the larger increase in quantity demanded.
C. the increase in quantity demanded will be the same for the ordinary and compensated demand curves.
D. we cannot predict whether ordinary or compensated demand will show the larger response in quantity demanded.

13. What do economists mean by the phrase "sunk costs are sunk"?
A. sunk costs are irretrievable, but they do lower profits and thus affect the firm's output level.
B. sunk costs are a primary reason why marginal costs tend to increase.
C. sunk costs cannot be recovered and are irrelevant to future decision making.
D. sunk costs lower consumer welfare, because producers "pass on" these costs in the form of higher prices.

14. If the average cost curve is downward sloping, then
A. marginal cost is smaller than average cost.
B. the marginal cost curve is also downward sloping.
C. there are increasing marginal returns to labor.
D. wages and other input prices are falling.

15. If the marginal rate of technical substitution of labor for capital ($MRTS_{LK}$) exceeds the relative price of labor in terms of capital (P_L/P_K), then
A. the firm's long-run average cost curve is rising.
B. the firm is producing its output at the least possible cost, but the firm should reduce its output level to increase its profits.
C. the firm has increased its output level beyond the point of diminishing marginal returns.
D. the firm needs to use less capital and more labor to reach its expansion path.

16. The marginal revenue curve of a competitive firm is
A. U-shaped.
B. a ray from the origin.
C. a horizontal line at the market price.
D. downward sloping.

考試科目	經濟學 B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

17. A competitive firm will shut down its operations in the short run when the market price falls below its
A. marginal revenue.
B. marginal cost.
C. average cost.
D. average variable cost.

18. Suppose that the pizza business is a competitive, constant-cost industry. An increase in demand for pizza, will, in the long-run lead to
A. an increase in price and industry output, but no increase in the output of existing firms.
B. no increase in price, no increase in the output of existing firms but an increase in industry output because of new firms.
C. no increase in price and an increase in industry output as each existing firm produces more.
D. no changes in price, output of existing firms or the number of firms in the industry.

19. Why is a small country more likely to gain from international trade than a large country?
A. Because autarkic relative prices in a small country are likely to be quite different from the world relative prices.
B. Because a small country, unlike a large country, does not have the resources it needs to be self-sufficient.
C. Because small countries tend to be specialized in their production, while large countries tend to be diversified.
D. Because a small country is less likely to encounter decreasing returns to scale than is a large country.

20. If demand is downward sloping and there is tax on the good, Consumer surplus equals
A. The area between the demand curve and the price, up to the equilibrium quantity.
B. Total surplus minus producer surplus.
C. Total surplus minus producer surplus and government tax revenue.
D. Total surplus minus producer surplus, government tax revenue, and dead-weight loss.

21. When a factor of production is in fixed supply, the revenue it earns
A. consists entirely of rent.
B. is an efficiency wage.
C. is independent of how the resource is used.
D. consists entirely of deadweight loss.

22. An efficient market is one in which
A. no rents are created.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

B. past prices can be used to predict the levels of future prices.
C. the principals can fully monitor the actions of their agents.
D. the price fully reflects all available information.

23. Insurance companies are not permitted to require AIDS tests as a precondition for coverage, so they do not know whether or not the people they insure have already contracted HIV (the virus that causes AIDS). This situation is an example of
A. signaling.
B. adverse selection.
C. the principal-agent problem.
D. moral hazard.

24. A firm is a monopoly if
A. it faces a demand curve for its product that equals market demand.
B. it is a very large firm.
C. it takes its rivals' actions into account when choosing its price and output levels.
D. its production decisions do not affect the price of its product.

25. In third-degree price discrimination, the monopolist will choose quantities so that each market has the same
A. price.
B. total revenue.
C. marginal revenue.
D. elasticity.

26. The practice of a firm setting a price so low that all firms incur losses is called
A. a tournament.
B. predatory pricing.
C. a buy-out strategy.
D. a contestable market.

27. When a supplier imposes resale price maintenance on its dealers, social gain will increase as long as
A. the supplier chooses to charge a competitive price for its product.
B. the value consumers receive from dealer services outweighs their cost.
C. dealers are allowed to charge consumers less than the supplier's recommended retail price.
D. dealers are able to enter and exit the industry costlessly.

28. A cartel member has the incentive to cheat on the cartel agreement because

考試科目	經濟學 B	系別	經濟學系三年級	考試時間	7 月 10 日(五) 第二節

A. it fears that other members may also cheat on the agreement.

B. the cartel prevents the member from charging the monopoly price.

C. undercutting the cartel price will increase the cartel member's profit.

D. the cartel outcome is not Pareto optimal for the cartel members.

29. The market for airplane service on a particular route is a commonly cited example of

A. resale price maintenance.

B. monopolistic competition.

C. the benefits of vertical integration.

D. a contestable market.

30. Which oligopoly model results in firms successively undercutting their rivals' prices until the competitive outcome is reached?

A. The contestable market model.

B. The Cournot model of oligopoly.

C. The Bertrand model of oligopoly.

D. The monopolistic competition model.

31. Firms in monopolistic competition resemble monopolies in that both types of firms

A. earn positive economic profits in the long run.

B. charge prices higher than their marginal costs.

C. possess barriers to entry that keep potential rivals out of the market.

D. produce their output so that their average cost is minimized.

32. A dominant strategy is one which

A. is best for a player no matter what strategy the other player chooses.

B. is optimal given the other player's strategy, but may not be optimal should the other player switch strategies.

C. will lead to a Pareto-optimal outcome.

D. will be chosen by the first player in a sequential game.

33. A game's outcome is a Nash equilibrium when

A. any attempt to improve one player's payoff will lower the other player's payoff.

B. neither player wants to change his strategy, given the strategy chosen by the other player.

C. the total payoff to the players is as large as possible.

D. the first player has selected his strategy taking the second player's optimal response into account.

考試科目	經濟學 B	系別	經濟學系三年級	考試時間	7 月 10 日(五) 第二節

34. In the Prisoners' Dilemma game,

A. the Nash equilibrium is the only outcome that is not Pareto optimal.

B. neither player has a dominant strategy.

C. the Stackelberg equilibrium will be Pareto optimal if the game is played sequentially.

D. all possible outcomes are Nash equilibria.

35. According to Pigovian analysis, when is a tax necessary to improve the market's economic efficiency?

A. When high transactions costs prevent private bargaining.

B. When the social marginal cost of production exceeds the private marginal cost.

C. When consumption of the good creates external benefits for others.

D. When at the competitive equilibrium, the social marginal benefit of the good equals its social marginal cost.

36. According to the Weak Coase Theorem, in the absence of transactions costs, the assignment of property rights has no effect on

A. damages paid by liable parties.

B. the distribution of income.

C. the allocation of resources.

D. economic efficiency.

37. A positive theory of common law, in which the positions of the courts are predicted based on the assumption that they are attempting to promote efficiency, is proposed by

A. Pigou.

B. Coase.

C. Posner.

D. Epstein.

38. The term "tragedy of the commons" is used to describe

A. overpricing of computer software by Microsoft.

B. an increase in rents when air quality in a community improves.

C. the difficulty in obtaining honest evaluations of public goods.

D. the elimination of social gains due to the overuse of property without a well-defined owner.

39. If people have identical tastes, then the economic rent created by a common property is

A. zero.

B. as large as possible.

C. positive, but not as large as possible.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

D. negative.

40. Private markets tend to undersupply nonexcludable goods because of
A. individuals' incentives to be untruthful.
B. overcrowding.
C. free riding.
D. dissipated rents.

41. A market failure occurs when
A. shortages or surpluses of some good cannot be eliminated.
B. a private market cannot provide a good in socially efficient quantities.
C. consumers' surplus falls to zero.
D. property is privately owned and people behave competitively.

42. Each additional unit of output produced by a unit of labor is valued at the price of the firm's output
A. always.
B. when the firm is selling in a competitive market.
C. when the firm has monopoly power in the market for its output.
D. when the firm has monopsony power in the market for labor.

43. Which of the following would cause the firm's short-run demand curve for labor to shift to the right?
A. A decrease in the wage rate.
B. An increase in the price of the firm's product.
C. An increase in the rental rate paid to capital.
D. A fall in the amount of complementary capital available.

44. In long-run equilibrium, a competitive firm can earn zero profit only if its technology exhibits
A. increasing returns to scale.
B. decreasing returns to scale.
C. constant returns to scale.
D. regressive returns to scale.

45. When there is an increase in the wage rate there will be
A. both a substitution effect and an income effect.
B. only a substitution effect.
C. only an income effect.
D. either a substitution effect or an income effect.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

46. When a consumer is impatient, his indifference curves for current and future consumption
A. are everywhere steeper than 45°.
B. must be straight lines.
C. are flatter than the budget line at the endowment point.
D. have absolute slopes greater than 1 along the 45° line.

47. An increase in the marginal productivity of capital will lead to
A. an increase in current consumption.
B. a rise in the interest rate.
C. a decline in the demand for current consumption.
D. a fall in the demand for capital.

48. According to the law of large numbers, when a gamble is repeated many times,
A. the average outcome increases.
B. the average outcome is the expected value.
C. the probability of each outcome changes.
D. insurance becomes less profitable when many people buy it.

49. When will an individual's indifference curves be identical with the iso-expected value lines?
A. Never.
B. When the individual is risk averse.
C. When the individual is risk neutral.
D. When the individual is risk preferring.

50. When speculators begin to sell futures contracts, suppliers will
A. try to sell more in the spot market.
B. store more of their crop to sell in the future.
C. not have any incentive to change their plans.
D. earn larger profits.

51. Fill in the blank for the following: GDP is the value of all ________ produced in a given period.
A. final and intermediate goods and services produced by the private sector only
B. final goods and services
C. final and intermediate goods and services, plus raw materials
D. all of the above
E. none of the above

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

52. A firm's value added equals
A. its revenue minus all of its costs.
B. its revenue minus its wages.
C. its revenue minus its wages and profit.
D. its revenue minus its cost of intermediate goods.

53. An individual is said to be a discouraged worker if he or she
A. is working, but prefers not to work.
B. is working part time, but would prefer a full time job.
C. wants to work, and is actively searching for a job.
D. wants to work, but has given up searching for a job.

54. The GDP deflator provides a measure of which of the following?
A. the ratio of GDP to the size of the population
B. the ratio of GDP to the number of workers employed
C. the ratio of nominal GDP to real GDP
D. real GDP divided by the aggregate price level

55. One of the reasons macroeconomists have concerns about inflation is that inflation causes
A. real GDP to rise.
B. nominal GDP to fall.
C. real GDP to exceed nominal GDP.
D. none of the above

56. Which of the following factors is NOT believed to affect output in the long run?
A. technology
B. monetary policy
C. the size of the labor force
D. the capital stock

57. The Okun's law shows the relationship between
A. inflation and unemployment rate.
B. output growth and unemployment.
C. inflation and output growth.
D. output growth and money supply.

58. Deflation generally occurs when which of the following occurs?

A. the consumer price index is greater than the GDP deflator
B. the consumer price index decreases
C. the rate of inflation falls, for example, from 4% to 2%
D. nominal GDP does not change

59. Hedonic pricing is used to
A. convert nominal values to real values.
B. calculate the difference between nominal GDP and real GDP.
C. measure the rate of change in real GDP.
D. none of the above

60. Disposable income equals
A. income minus saving.
B. income minus both saving and taxes.
C. consumption minus taxes.
D. the sum of consumption and saving.

61. Suppose the consumption equation is represented by the following: $C = 250 + .75Y_D$. Given this information, the marginal propensity to save is
A. 0.25.
B. 0.75.
C. 1.
D. 4.

62. Which of the following would tend to make the multiplier smaller?
A. an increase in the marginal propensity to consume
B. an increase in the marginal propensity to save
C. a reduction in taxes
D. a reduction in government spending

63. Which of the following is a flow variable?
A. income
B. money
C. financial wealth
D. none of the above

64. Which of the following is NOT an asset on a bank's balance sheet?

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

A. reserves
B. loans
C. checkable deposits
D. none of the above

65. Which of the following generally occurs when a central bank pursues contractionary monetary policy?
A. the central bank purchases bonds and the interest rate increases.
B. the central bank purchases bonds and the interest rate decreases.
C. the central bank sells bonds and the interest rate increases.
D. the central bank sells bonds and the interest rate decreases.

66. Based on our understanding of the determinants of the interest rate and bond prices, we know that a reduction in income will cause
A. an increase in bond prices and an increase in the interest rate (i).
B. a reduction in bond prices and an increase in the interest rate (i).
C. an increase in bond prices and a reduction in the interest rate (i).
D. a reduction in bond prices and a reduction in the interest rate (i).

67. The LM curve shifts down (or, equivalently, to the right) when which of the following occurs?
A. an increase in taxes
B. an increase in output
C. an open market sale of bonds by the central bank
D. none of the above

68. If government spending and taxes decrease by the same amount,
A. the IS curve does not shift.
B. the IS curve shift leftward.
C. the IS curve shifts rightward.
D. the LM curve shifts downward.

69. Efficiency wage theory suggests that
A. workers will be paid less than their reservation wage.
B. productivity might drop if the wage rate is too low.
C. the government can only set tax rates so high before people will prefer not to work.
D. unskilled workers will have a lower turnover rate than skilled workers.

70. Answer this question using the AS/AD model presented in the textbook. Which of the following would

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

cause a reduction in the natural level of output in the medium run?

A. a decrease in government spending

B. a decrease in the money supply

C. an increase in taxes

D. none of the above

71. The original Phillips curve implied or assumed that

A. the markup over labor costs was zero.

B. the expected rate of inflation would be zero.

C. the actual and expected rates of inflation would always be equal.

D. none of the above

72. Which of the following will most likely cause a change in the natural rate of unemployment?

A. changes in monetary policy

B. changes in fiscal policy

C. changes in expected inflation

D. none of the above

73. Which of the following must occur to sustain economic growth in the long run?

A. technological progress

B. capital accumulation

C. a higher saving rate

D. all of the above

74. Which of the following will cause an increase in output per worker (Y/N)?

A. an increase in the capital stock (K)

B. an increase in the saving rate

C. an increase in K/N

D. all of the above

75. The golden rule level of capital refers to

A. the level of capital that maximizes output per worker.

B. the level of capital that maximizes the standard of living.

C. the level of capital that maximizes consumption per worker in the steady state.

D. none of the above

76. Which of the following represents the change in the capital stock?

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

A. consumption minus depreciation
B. output minus depreciation
C. investment minus saving
D. investment minus depreciation

77. If the nominal interest rate is less than the real interest rate, we know that
A. the nominal interest rate must be equal to expected inflation.
B. expected deflation must be occurring.
C. expected inflation must be positive.
D. expected inflation must be zero.

78. Because the nominal interest rate is always positive, the discount factor is always
A. negative.
B. greater than one.
C. zero.
D. less than one.

79. Suppose the central bank pursues contractionary monetary policy. Such an action will cause
A. the natural real interest rate to rise.
B. the natural real interest rate to fall.
C. ambiguous effects on the natural real interest rate.
D. no effect on the natural real interest rate.

80. A "junk bond" is a bond with a
A. low yield to maturity.
B. low face value, but high coupon rate.
C. high default risk.
D. very low maturity.

81. Equity finance is represented by which of the following?
A. when a firm borrows money from banks
B. when a firm sells bonds
C. when a firm sells shares of stock
D. when a firm draws down retained earnings

82. Which of the following represents a stock's fundamental value?
A. the price the stock would sell at in the midst of a rational bubble

考試科目	經濟學B	系　　別	經濟學系三年級	考試時間	7月10日(五) 第二節

B. the price the stock would sell at if the interest rate were zero

C. the present value of its expected future dividend payments

D. the simple sum of its future dividend payments

83. An expected tax cut will tend to cause

A. an increase in stock prices.

B. a reduction in stock prices.

C. no change in stock prices.

D. an ambiguous effect on stock prices.

84. The "depreciation rate" tells us

A. the rate at which consumers deplete their total wealth in retirement.

B. the difference between current and expected income.

C. the difference between current and expected profits.

D. how much usefulness a machine loses from year to year.

85. Which of the following will occur when the capital stock increases?

A. profit per unit of capital will increase

B. profit per unit of capital will decrease

C. there will be no change in profit per unit of capital

D. there will be an ambiguous effect on profit per unit of capital

86. The IS curve shifts to the left where there is

A. a reduction in current taxes.

B. an increase in expected future taxes.

C. an increase in expected future output.

D. none of the above

87. Which of the following best defines the real exchange rate?

A. the price of foreign bonds in terms of domestic bonds

B. the price of foreign currency in terms of domestic currency

C. the price of domestic goods in terms of foreign goods

D. the price of domestic currency in terms of foreign currency

88. A reduction in the real exchange rate indicates that

A. foreign goods are now relatively cheaper.

B. foreign goods are now relatively more expensive.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

C. domestic goods are now relatively more expensive.

D. both A and C

89. Which of the following will always cause an increase in net exports?

A. a reduction in domestic output

B. an increase in the real exchange rate

C. an increase in government spending

D. an increase in investment

90. Which of the following will occur as a result of a tax increase?

A. private saving increases

B. investment increases

C. the trade balance improves

D. the trade balance worsens

91. The primary deficit is

A. government spending minus interest on the debt.

B. government spending minus net tax revenues.

C. government spending plus interest on the debt minus net tax revenues.

D. government spending plus net tax revenues minus interest on the debt.

92. The debt-ratio is the ratio of the debt to

A. government spending.

B. taxes.

C. personal disposable income.

D. GDP.

93. The Ricardian Equivalence proposition suggests that a tax increase that causes a budget surplus will

A. cause an increase in output.

B. cause no change in output.

C. cause a reduction in consumption.

D. cause an increase in consumption

94. The correct measure of the deficit is also called

A. the cyclically-adjusted deficit.

B. the structural deficit.

C. the full-employment deficit.

考試科目	經濟學B	系別	經濟學系三年級	考試時間	7月10日(五) 第二節

D. the inflation-adjusted deficit.

95. Siegnorage is equal to
A. the rate of inflation.
B. real money balances.
C. the percentage growth rate of nominal money.
D. the percentage growth rate of nominal money times real money balances.

96. Hyperinflation typically leads to
A. a reduction in barter.
B. a reduction in real money balances.
C. a preference for domestic over foreign currency.
D. an increase in real tax revenues collected by the government.

97. Monetary policy has medium-run effects on which of the following?
A. the level of output but not its composition
B. both the level and composition of output
C. only the price level
D. the level of output AND the price level

98. The discount rate represents the interest rate on
A. overnight loans between banks.
B. three-month U.S. securities.
C. municipal bonds.
D. one-year discount bonds.

99. Liquidity preference refers to
A. Keynes' name for the demand for money.
B. the "random walk" behavior of consumption spending.
C. monetarists explanations for stagflation.
D. real business cycle theorists' explanations for stagflation.

100. According to real business cycle theorists,
A. price and wage rigidity explain most changes in output.
B. efficiency wage theory explains wage rigidity.
C. changes in output primarily represent changes in the natural level of output.
D. fiscal policy explains most changes in efficiency wage theory.

備註	一、作答於試題上者，不予計分。 二、試題請隨卷繳交。

國立政治大學 104 學年度轉學生招生考試試題

考試科目	統計學	系別	經濟系 三年級	考試時間	7月10日(五) 第四節

注意事項：

*不可使用計算機。

*答題請寫出推導過程，否則不予計分。

1. (10%) 某著名大學經濟系一至四年級學生人數比例為 25%、28%、26%、21%。根據調查，各年級中擔任家教的學生比例分配分別為 20%、30%、35%、15%。已知有一個政大附中國中部學生的家教恰好為該經濟系的學生，請問這位家教老師為該大學經濟系二年級學生的機率為何？

2. (40%) X，Y 為雙變量隨機變數，其條件機率 P({Y=b} | {X=a})如下表：

	Y=2	Y=4	Y=6
X=5	1/3	2/3	0
X=10	1/10	0	9/10
X=15	0	1	0

又知 X 的機率函數為下表：

a	5	10	15
$f_x(a)$	1/3	5/9	1/9

請回答下列各小題。

(a) X 與 Y 的聯合機率函數。

(b) 請計算條件平均數 E(Y|X=10)。

(c) 請計算共變異數 Cov(X,Y)。

(d) 請問 X 與 Y 是否獨立？

3. (10%) 已知二項試驗是由 n 個互相獨立且相同的白奴里試驗組成，其中對應於白奴里試驗的白奴里隨機變數的參數為 p。若是二項分配的均數為 18，標準差為 4，請問該分配的參數 n 和 p 各為多少？

國立政治大學 104 學年度轉學生招生考試試題

考試科目	統計學	系別	經濟系 三年級	考試時間	7月10日(五) 第四節

4. (20%) $\{X_1, \ldots, X_{100}\}$為一組獨立且有相同分配的隨機變數，其分配為常態分配，平均數為μ_0，變異數為 9。

   (a) 若虛無假設為 $\mu_0 = 0$ ，請寫下檢定統計量並說明其虛無分配。

   (b) 請問 (a) 小題的檢定統計量在 $\mu_0 = -1$ 時的分配為何？。

5. (20%) 考慮兩種線性迴歸模型設定如下：

$$Y_i = \alpha + \beta X_i + U_i, i = 1,2,\cdots,n.$$

$$X_i = \gamma + \delta Y_i + V_i, i = 1,2,\cdots,n.$$

請問這兩條估計的迴歸線都會通過 (X,Y) 平面上的那一點? 請問在什麼情況下，這兩條估計的迴歸線會互相重疊?

備註	一、作答於試題上者，不予計分。 二、試題請隨卷繳交。