## INDIAN SCHOOL SOHAR <br> TERM 2 EXAMINATION (2019-2020) <br> ECONOMICS [030]

CLASS: XI
MAX MARKS: - 80
DATE: 07/01/2020
DURATION: - 3HRS

## General Instructions:-

1) All questions in both the sections are compulsory.
2) Marks for questions are indicated against each question.
3) Answer should be brief and to the point and the above word limit should be adhered to as far as possible.
4) Attempt all parts of a question together.
5) Questions 1-10 and 18-27 are very short-answer questions carrying 1 mark each. They are required to be answered in one sentence each.
6) Questions 11 - 12 and $28-29$ are short answer questions carrying 3 marks each. Answer to them should not exceed 75 words each.
7) Questions 13-15 and 30-32 are also short answer questions of 4 marks each. Answer to them should not exceed 90 words each.
8) Questions 16-17 and 33-34 are long answer questions of 6 marks each. Answer to them should not exceed 200 words each.

## SECTION A: INTRODUCTORY MICRO ECONOMICS

1. The consumers optimum condition according to utility approach is: (Choose the correct option)
A. Marginal Utility of the good = Price of the good.
B. Marginal Rate of Transformation = Price Ratio of the two goods
C. Marginal Rate of Substitution =Price of the good
D. Marginal Rate of Substitution =Price Ratio of the two goods
2. Collusive oligopoly refers to a situation:
A. where firms cooperate with each other in setting price and output
B. where firms compete with each other and follows its own price and output policy
C. every firms tries to increase its market share through competition
D. only one firm sets the price
3. If a firm's production department data says that the total variable cost for producing 8 units and 10 units of output is $₹ 2,500$ and $₹ 3,000$ respectively, marginal cost of $10^{\text {th }}$ unit will be
A. ₹ 100
B. ₹ 150
C. ₹ 500
D. ₹ 250
4. A firm is able to sell more quantity of a good only by lowering the price. The firm's marginal revenue, as he goes on selling, would be:
A. Greater than average revenue
B. Less than average revenue
C. Equal to average revenue
D. Zero
5. Which of the following diagram depicts the shape of the Production Possibility curve in case of decreasing marginal rate of transformation?

6. If Marginal Rate of Substitution is increasing throughout, the Indifference Curve will be :
A. Downward sloping convex
B. Downward sloping concave
C. Downward sloping straight line
D. Upward sloping convex
7. If $X$ and $Y$ are complementary goods, then with the increase in price $X$ :
A. Demand of $X$ will decrease and demand of $Y$ will increase.
B. Demand of $X$ will increase and demand of $Y$ will decrease.
C. Demand of $X$ and $Y$ will increase.
D. Demand of $X$ and $Y$ will decrease
8. Suppose total revenue is rising at a constant rate as more and more units of a commodity are sold, marginal revenue would be :
A. Greater than average revenue
B. Equal to average revenue
C. Less than average revenue
D. Rising
9. There is inverse relation between price and demand for the product of a firm under :
A. Monopoly only
B. Monopolistic competition only
C. Both under monopoly and monopolistic competition
D. Perfect competition only
10. When both the demand and supply curves shifts to indicate increase in demand and supply in the same proportion
A. Only equilibrium price remains unchanged
B. Only equilibrium quantity remains unchanged
C. Equilibrium price remains unchanged but equilibrium quantity decreases
D. Equilibrium price remains unchanged but equilibrium quantity increases
11. Explain the relation between Marginal Cost and Average Variable Cost with the help of diagram.

## OR

What is Average Fixed Cost of a firm? Why is an Average Fixed Cost Curve a rectangular Hyperbola? Explain with help of a diagram.
12. Complete the following table

| Output (units) | AFC in ₹ | AC in ₹ | AVC in ₹ | MC in ₹ |
| :---: | :--- | :--- | :--- | :---: |
| 1 |  | 140 |  | 50 |
| 2 |  |  | 45 |  |
| 3 |  |  |  | 45 |
| 4 | 22.5 |  | 52 |  |
| 5 | 18 |  | 52 |  |

13. Suppose a consumer can afford to buy 6 units of Good 1 and 8 units of Good 2. She spends her entire income the prices of the two goods are ₹6 and ₹ 8 respectively.
14. How much is the consumer's income?
15. What happens to the budget set if both the prices as well as the income double?
16. If a consumer has monotonic preferences, can she be indifferent between the bundles $(10,8)$ and $(8,6)$ ?
17. How does the budget line change if the consumer's income increases to ₹ 40 but the prices remain unchanged?

## OR

A consumer consumes only two goods X and Y whose prices are $₹ 4$ and $₹ 5$ per unit respectively. If the consumer chooses a combination of the two goods with marginal utility of $X$ equal to 5 utils and that of $Y$ utils equal to 4 , is the consumer in equilibrium? Give reasons. What will a rational consumer do in this situation? Use utility analysis.
14. What is meant by Price Floor? Discuss in brief, any one consequence of imposition of floor price above equilibrium price with help of a diagram.

OR
How is the price of a commodity determined in a perfectly competitive market? Explain with help of a diagram.
15. Distinguish between
A. Ordinal utility and cardinal utility
B. Perfectly elastic demand and perfectly in elastic demand.
16. A. How does the increase in the number of firms in a market affect the market supply curve?
B. The price elasticity of good $X$ is half the price elasticity of supply of Good $Y$. A $10 \%$ rise in the price of Good $Y$ results in a rise in its supply from 400 units to 520 units. Calculate the percentage change in quantity supplied of good X when its price falls from $₹ 10$ to $₹ 8$ per unit.
17. Explain the meaning and conditions of producer's equilibrium under perfect competition using

Marginal Cost and Marginal Revenue approach. Use diagram.

## SECTION B: STATISTICS FOR ECONOMICS

18. The range of simple correlation coefficient is
A. zero to infinity
B. minus infinity to infinity
C. minus one to plus one
D. zero to one
19. Price index of the year 2005 for a place is 175 with the year as 2000 , then the increase is
a. $175 \%$
b. $80 \%$
c. $75 \%$
d. $25 \%$
20. For finding the degree of agreement or disagreement between two judges when deciding the result of a competition, we use
A. Karl Pearson's coefficient of correlation
B. Scatter diagram
C. Spearman's coefficient of correlation
D. None of these
21. The standard deviation of wages earned by 50 workers in a factory was $₹ 200$. If the wages of each worker are raised by $₹ 50$, then standard deviation is
A. ₹ 150
B. $₹ 250$
C. $₹ 40$
D. $₹ 200$
22. Dispersion based on only the central fifty percent of observations is called
A. Standard deviation
B. Quartile deviation
C. Mean deviation
D. Variance
23. Exit poll that shows the chances of winning the number of seats by different parties in 2014 Lok Sabha election shown on T.V by some channels for the viewers is
A. Primary data
B. Secondary data
C. Continuous data
D. Discrete data
24. Which diagram is preferred to show the data in a series in which some values may be very small and some very large?
A. percentage bar diagram
B. broken bar diagram
C. simple bar diagram
D. multiple bar diagram
25. Sample method is suitable for the investigation in which
A. the size of population is large
B. high degree of accuracy is not required
C. there are widely diverse items
D. Intensive examination of diverse items is required.
26. If variance is 144 , then Standard deviation is
A. 12
B. 44
C. 6
D. 72
27. What will be the degree of an angle in the pie diagram if a household spends $80 \%$ of his income on a good?
A. $180^{\circ}$
B. $288^{\circ}$
C. $80^{\circ}$
D. $72^{\circ}$
28. Define statistics in the singular sense. Identify and explain the stages of statistical study.

OR
Suppose, $30 \%$ rise in prices have been due to several causes, like reduction in supply, increase in demand, shortage of power, rise in wages, rise in taxes etc. Which feature of statistics does it
indicate? Explain any three other features of statistics
29. Differentiate between
A. Inclusive classification and exclusive classification
B. Indirect oral investigation and direct personal investigation
30. The following information shows the number of students studying in various faculties in three academic years. Draw a percentage bar diagram.

| Year | No. of students |  |  | Commerce |
| :--- | :--- | :--- | :--- | :--- |
|  | Fine arts | Humanities |  |  |
| $2013-2014$ | 400 | 1200 | 500 | 300 |
| $2014-2015$ | 400 | 1500 | 1000 | 400 |
| $2015-2016$ | 300 | 500 |  |  |

OR
The following data shows marks obtained by the students of a class. Construct a histogram and a frequency polygon from the following data.

| Marks | $0-10$ | $10-20$ | $20-30$ | $30-40$ | $40-50$ | $50-60$ | $60-70$ | $70-80$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. of students | 10 | 16 | 20 | 20 | 22 | 15 | 8 | 6 |

31. Find the quartile deviation and its coefficient from the following data.

| S no. | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| income | 14 | 13 | 20 | 21 | 19 | 23 | 15 | 16 | 17 | 25 | 26 | 39 | 36 | 34 |
| 5 | 0 | 0 | 0 | 8 | 4 | 9 | 0 | 8 | 7 | 0 | 0 | 0 | 5 |  |

32. Calculate the standard deviation (using step deviation method

| Marks | $0-10$ | $10-20$ | $20-30$ | $30-40$ | $40-50$ | $50-60$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Frequency | 8 | 12 | 20 | 30 | 20 | 10 |

33. A. Calculate Karl Person's coefficient of correlation between $X$ and $Y$ series for 15 pair

|  | X-series | Y series |
| :--- | :---: | :---: |
| Mean | 80 | 120 |
| Sum of the squares of deviation from Assumed Mean | 50 | 156 |
| Sum of the product of deviations of $X$ and $Y$ from their <br> respective Mean | 92 |  |

B. Calculate the co efficient of rank correlation between the marks in economics and statistics as Indicated by 8 answer books of each of two examiners.

| Marks in economics | 15 | 10 | 20 | 28 | 12 | 10 | 16 | 18 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Marks in statistics | 40 | 30 | 50 | 30 | 20 | 10 | 30 | 60 |

34. Construct the Consumer Price Index Number for 2005 on the basis of 2004 from the following data.
A. Aggregative Expenditure Method
B. Family Budget Method

| Articles | Quantity <br> consumed in <br> 2004 | Unit | Price in 2004 (₹) | Price in 2005(₹) |
| :--- | :--- | :--- | :--- | :--- |
| Wheat | 2 Qtl | Per Qtl | 150 | 165 |
| Gram | 1 Qtl | Per Qtl | 80 | 100 |
| Rice | 1 Qtl | Per Qtl | 120 | 150 |
| Bajra | 1.5 Qtl | Per Qtl | 60 | 90 |
| Arhar | 1.5 Qtl | Per Qtl | 100 | 140 |
| Oil | 10 Kg | Per Kg | 10 | 12 |
| Gur | 40 Kg | Per Kg | 2 | 3 |

