DELHI PUBLIC SCHOOL GAYA
ASSIGNMENT SESSION 2018–19
CLASS – XI

Instruction: – Kindly do your assignment work in assignment copies of the subjects.

ENGLISH CORE

1. Read a newspaper everyday and select two interesting news reports from the front page and two articles from the editorial page of the English newspaper and paste them in your notebook.

2. Find five new words every day and look up their meaning in the dictionary. Write them in your notebook, learn their spellings, their meanings and do use them in sentences of your own.

3. Prepare a speech to be given in the morning assembly on the topic, "Utility of Holiday Homework".

OR

"Importance of Discipline in Life"

4. Prepare a poster in the topic "Save Water".

5. Write a formal letter to the editor of a national daily about frequent power cuts in your locality and do suggest the ways to improve the situation.

HINDI

1. निम्नलिखित काव्यांश को घ्यानपूर्वक पढ़कर पूछे गए प्रश्नों के उत्तर लिखिए –

1. 'स्पीति में बारिश' एक यात्रा–वृतांक है। इसमें यात्रा के दौरान किए गए अनुभवों, यात्रा–स्थल से जुड़ी विभिन्न जानकारियों का बारीकी से वर्णन किया गया है। आप भी अपनी किसी यात्रा का वर्णन लगभग 200 शब्दों में कीजिए।

2. ऐसी पाँच रचनाओं का संकलन कीजिए जिसमें प्रकृति के उपादानों की कल्पना संदेशवाहक के रूप में की गई हैं।

3. विभिन्न व्यापारी अपने उत्पाद की बिक्री के लिए अनेक तरह के विज्ञापन बनाते हैं। आप भी हाथ से बनी किसी वस्तु की बिक्री के लिए एक ऐसा विज्ञापन बनाइए जिससे हस्तकला का कारोबार चले।

4. घर के अलग होकर आप घर को किस तरह से याद करते हैं? अपने मनोभावों को 80–100 शब्दों में प्रकट कर लिखिए।

MATHEMATICS

1. Find the 4th term the beginning and 4th term from the end in the expansion of $\left(x + \frac{2}{x}\right)^9$.

2. Find the middle term in the expansion of:

(i) $\left(\frac{2}{3}x - \frac{3}{2x}\right)^{20}$ (ii) $\left(3x - \frac{x^3}{6}\right)^9$

3. Find the middle term(s) in the expansion of:

(i) $(1 - 2x + x^2)^n$ (ii) $(1 + 3x + 3x^2 + x^3)^{2n}$

4. Find the term independent of x in the expansion of the following expressions:

$$\left(\sqrt{\frac{x}{3}} + \frac{\sqrt{3}}{2x^2}\right)^{10}$$

5. If the coefficients of $(2r+4)$th and $(r-2)$th terms in the expansion of $(1+x)^{18}$ are equal, find r.

6. Prove that the term independent of x in the expansion of $\left(x+\frac{1}{x}\right)^{2n}$ is $\frac{1\,.\,3\,.\,5\,....\,(2n-1)}{n!}\,.\,2^n$.

7. If the coefficients of 2nd, 3rd and 4th terms in the expansion of $(1+x)^{2n}$ are in A.P., show that $2n^2-9n+7=0$.

8. Find the coefficient of a^4 in the product $(1+2a)^4(2-a)^5$ using binomial theorem.

9. If in the expansion of $(1+x)^n$, the coefficients of three consecutive terms are 56, 70 and 56, then find n and the position of the terms of these coefficients.

10. If the coefficients of three consecutive terms in the expansion of $(1+x)^n$ be 76, 95 and 76, find n.

11. If the 6th, 7th and 8th terms in the expansion of $(x+a)^n$ are respectively 112, 7 and 1/4, find $x,\ a,\ n$.

12. If p is a real number and if the middle term in the expansion of $\left(\frac{p}{2}+2\right)^8$ is 1120, find p.

13. Find n in the binomial $\left(\sqrt[3]{2}+\frac{1}{\sqrt[3]{3}}\right)^n$, if the ratio of 7th term from the beginning to the 7th term from the end is $\frac{1}{6}$.

BUSINESS STUDIES

➤ Prepare a detailed survey report on Services provided by SEBI.
- Introduction
- History
- Objectives
- Functioning
- Contribution in Corporate Sector
- Case studies about recent actions taken by SEBI and
- Conclusion Research report

OR

➤ Prepare a detailed survey report on Services provided by RBI.
- Introduction
- History
- Objectives
- Functioning
- Contribution in Corporate Sector
- Role at the time of Demonetization and
- Conclusion Research report

ACCOUNTANCY

1. You are the founder and director of a perfume manufacturing company. You have started it on 1st April, 2018 with the help of Cash and some assets. Now, you are required to show various transaction which he have incurred during the first month of business. Also show its Journal Entry, Cash book and Ledger in his book. At least 35 transactions.

ECONOMICS

Prepare a research report on:

1.   TRIPS – Trade-Related Intellectual Property Rights
2.   GATT- General Agreement on Trade and Tariffs
3.   BRICKS- Brazil, Russia, India, China and South Africa
4.   How GDP new series changes the picture of Indian economy?

Students are asked to prepare statistical data on these four points.

Introduction

1.   What is likely to be the impact of make in India appeal to the foreign investors by the PM of India?
2.   Explain the concept of MRT with the help of numerical and schedule.
3.   What will be the impact of Sarvashiksha Abhiyan on the PPC of Indian economy?
4.   What is likely to be the impact of efforts towards reducing un-employment in India?
5.   Large no. of technical training institutes started by the govt. state its economic value in context of PPC.
6.   What will be the impact of recently launched clean India mission on the PPC of economic & why?
7.   Production in economy below its potential level is due to which govt. started employment scheme. Explain its effect on PPC.
8.   Using a diagram explain what will happen to PPC of Bihar if river Kosi will cause widespread flood?
9.   Economist slowdown in some parts of the world had adversely affected India's export. Explain this context on India's PPC.
10.   A shift from actual level of output to the potential level of output is not indicated by shift in PPC to right.

CONSUMER EQUILIBRIUM

1.   Difference between cardinal and ordinal utility analyses?
2.   Explain the concept of consumer equilibrium in two commodity case through utility analysis.

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Explain the law of Equi-marginal utility.

3.   Explain the concept of consumer equilibrium through IC analysis.
4.   Explain the various properties of IC curve.
5.   Explain the concept of MRS with the help of numerical example.
6.   A consumer consumes only two goods X and Y. Prices of these goods 4 and 5 per unit respectively. If the consumer chooses the combination of two goods with marginal utility X=5 & Y=4. Is the consumer in the equilibrium? Give reasons. What will a rational consumer will do in this situation.
7.   A consumer consumes only two goods X and Y. Price of both good is 3 per unit. If a consumer chooses consumption of these two goods. MRS=3.is the consumer is in equilibrium. Give reason. What will a rational consumer do in this situation?
8.   Explain the concept of DMU with assumptions.
9.   Explain the relation between TU and MU.

DEMAND

1.   Differentiate between change in demand and quantity demanded.
2.   Differentiate between increase in demand and extension of demand.
3.   Differentiate between decrease in demand and contraction of demand.
4.   Explain the effect of increase/decrease in income of the consumer on the demand for a commodity.
5.   Explain the effect of increase/decrease in price of related goods on the demand for a given commodity.

6. What are the exception to law of demand?
7. Why the demand curve is downward sloping.

OR

What are the reasons for the operation of law of demand?

OR

Why the demand of commodity increases when price decreases?

Elasticity

1. Explain the various price elasticity of demand.
2. Explain the factor affecting demand.
3. Explain the geometric method for measuring price elasticity of demand.
4. Explain the relationship between slope and price elasticity of demand.
5. Difference between:

   (i)   Substitute and complimentary goods
   (ii) Inferior and normal goods
   (iii) Market demand and individual demand

INFORMATICS PRACTICES

1. Design a GUI application in Java netbeans and write a suitable coding to input three numbers and display the maximum, minimum and equal numbers.

2. Design a GUI application in Java netbeans and write a suitable coding to input the market price of an article and calculate the discount and hence display the selling price in a an appropriate swing control. (the rate of discount can be consider as per your choice).

3. Design a GUI application in Java netbeans and write a suitable coding to display a menu as follows :

   (a)   Circle   (b)   Cone

   (c)   Cylinder   (d)   Cuboid

   From the above list of choices, user needs to input a particular choice and hence display the area, perimeter and the length of diagonal (wherever applicable). If user inputs a wrong choice display and appropriate message to the user.

4. Design a GUI application in Java netbeans and write a suitable coding to input a digit from 1 to 7 and display the corresponding day of the week using a menu driven structure.

5. Design a GUI application in Java netbeans and write a suitable coding to input a number and display whether it's a prime or non-prime number.

PHYSICAL EDUCATION

1. Draw a labelled diagram of 400 mtrs. track and field with proper computation.

2. Computation of BMI from family or neighbourhood and graphical representation of the data.

3. Labelled diagram of field and equipment of any one game of your choice out of the following list : badminton, swimming, table-tennis, taekwondo.

4. Pictorial presentation of any five Asanas for improving concentration.

5. Write a short note on physical education and sports of differently abled.

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