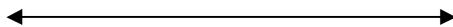


**PROJECT : 2020-21**  
**CLASS –X I**

**PROJECT WORK (SUBMISSION DATE: 1<sup>st</sup> July 2020)**

**ENGLISH LANGUAGE**

- Question 1) Prepare a writeup narrating an experience you had while travelling from Lucknow to Delhi when you had to take some goods and a letter to someone in Delhi. While you prepare keep the following points in mind
- At the very beginning make it clear, what you are going to talk about.
  - Support what you say with reason and evidence.
  - Conclude.



**ENGLISH LITERATURE**

- Question 1) The poem Dolphin is about oppression and lack of freedom. Dolphins which are an endangered species needs special attention. Write an assignment of 1000-1500 words on the Dolphins and their loss of freedom. Adhere to the following instructions:

**Intro**

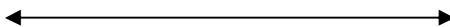
- Give a title to the assignment in the form of a question.
- Explain the question.
- How you are going to interpret the chosen text.

**Body**

Keep to the question and organise a well structured treatment of the question using appropriate subheadings.

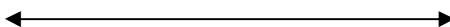
**Conclusion**

Summarises the main points, giving it a fitting conclusion  
Your assignment should have close connection to the poem Dolphins by Carol Ann Duffy.



**HINDI**

- 1- ^, d I Ppfj=] I R; fu'B o i jk dkjh usk ft I usvki dks i W for fd; k gk ml dk thou n"ku fyf[k, A\*\*
- 2- ^dchj dh I K[k; k fglhh I Kgr; dh veW; fuf/k gA\*\* bl dFku dsvk/kj ij Li'V dft, fd dchj ,d I Ppsl ekt I Kjd FlA



**PHYSICS**

**Select any one for Project Work from the following:**

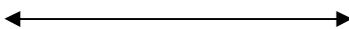
1. Vectors, Scalars and Elementary Calculus.
2. Dynamics
3. Oscillations and Waves
4. Heat and Thermodynamics
5. Properties of Matter



**CHEMISTRY**

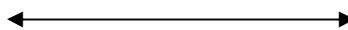
**Select any two of the project work from the following:**

1. Environmental pollution (Air, water and soil pollution)
2. Ancient Indian medicine and medicinal plant
3. Preparation of potash alum, soap, detergent, shampoo and  $\text{CuSO}_4$ .
4. Vitamins and Hormones.
5. Chemical in medicine: Antiseptic, antibiotics, antacids, and there uses.
6. Polymers: PVC, Teflon, Rubber, Thermoplastic and thermosetting plastics: (Methods of preparation, characteristics and uses.)

**BIOLOGY**

**Choose any one of the following topics:-**

- (i) Endocrine glands and its disorders.
- (ii) Biomolecules
- (iii) Cell theory, structure and function of Prokaryotic and Eukaryotic cell.
- (iv) Diabetes

**MATHEMATICS**

**Candidates will be expected to have completed two projects, one from Section A and one from either Section B or Section C**

**Section – A**

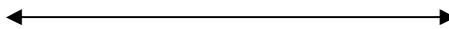
Using Venn diagram, verify the distributive law for three given non-empty sets A, B and C

**Section – B**

Construct different types of Conics by Power Point Presentation, or by making a model, using the concept of double cone and a plane.

**Section – C**

Identify the purchasing power using the concept of cost of living index number.



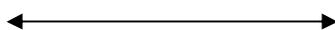
**COMPUTER SCIENCE****Project**

- 1- Develop a console – based application using Java to find name of the bank and branch location from IFSC.
- 2- Develop a console based application using Java for Movie Ticket Reservation.

**Assignment**

- 1- Write a menu driven program to print the following pattern –
 

a)    5 4 3 2 1 4 3 2 1 3 2 1 2 1 1	b)    1 2 3 4 5 2 3 4 5 3 4 5 4 5 5
c)            1 1 0 1 1 0 1 0 1 1 0 1 0 1 0 1 1 0 1 0 1 0 1 0 1	d)    1 2 3 4 5 4 3 2 1 1 2 3 4 3 2 1 1 2 3 2 1 1 2 1 1
- 2- A number is called a Smith number if the sum of the digits of the number is equal to the sum of the digits of prime factors of the number.  
 Eg: 666  
 Prime factors are 2, 3, 3 and 37  
 Sum of the digits are (6+6+6) = 18  
 Sum of the digits of the prime factors (2+3+3+(3+7)) = 18 Hence 666 is a Smith number.
- 3- Write a program in Java to enter any number and determine whether it is a Krishna Murthy number or not, to be a Krishna Murthy number – sum of the factorial of the digits = The number itself.  
 Eg:    145 = 1! + 4! + 5!  
       = 1 + 24 + 120 = 145
- 4- Write a program in Java to input any number and determine whether it is a Magic number or not. A number is said to be a Magic number if the sum of the subsequent digits is equal to 1.  
 Example:    991 = (9+9+1) = 19  
               9+1 = 10  
               10 = 1 + 0 = 1  
               991 is a magic No.
- 5- Write a menu driven program to find the sum of the following series
  - a)     $S = 5 + 10^2 + 15 + 20^2 + 25 + \dots$  n terms
  - b)     $S = 2 + 4^2 + 6^3 + 8^4 + 10^5 + \dots$  n terms
  - c)     $S = (1^2 * 2^3) + (2^2 * 3^3) + (3^2 * 4^3) + \dots$  n terms.
- 6- Write a program in Java to fill a 2 D array of order 3 x 4, print the row wise sum of the elements.
- 7- Write a program in Java to input any string and print the reverse of each word.
- 8- Write a program to create an array of size 50. Sort the elements of an array in descending order using selection sort
- 9- Write a program in Java to enter any string and make a new string by swapping the first and the last character of each word.
- 10- Write a program in Java to enter any string and print the next character for each alphabet in circular way.  
 Example :    Input: ZOOMY ZEBRAS  
               Output: APPNZ AFGSBT
- 11- Write a program to find the value of the given expression.  $C = \frac{n!}{(n-r)! * r!}$  where n and r will be given by the user. Make a separate class that will have a function to complete the factorial of a number n and return the same.
- 12- A music store was auctioning some of its old music instruments. Create a file named Instrument.txt and store the name, cost price and sell price of the music instrument on auction.  
 In another operation create another text file named Profit.txt in which transfer the names of these instruments which incurred profit on auction, also write the amount of profit incurred.
- 13- Create a file named Ramfall.txt and store the annual approximate ramfall (in inches) collected in a year in various cities across the world. Read the data from the file. Print the cities which get rainfall below 50 inch.
- 14- Write a recursive function to find the product of first n natural number.
- 15- Write a recursive function to find the HCF of two numbers.



**ECONOMICS**

**[SEQUENCE:- Name, Contents, Acknowledgement, Introduction of Project Work- All the topics to be mentioned, Objectives of Project Work, Detailed Matter, Conclusion, Bibliography]**

**TOPIC-I**

Prepare a report on the various poverty alleviation and employment generation programmes started in India, with special focus on MNREGA. Submit a file with the detailed report.

**TOPIC-II**

Study consumer awareness amongst households through designing a 'Questionnaire' and collection of primary data with a file covering following captions: -

- (1) Consumer Movement: A Global History.
- (2) Consumer Protection Act 1986 & its' Features.
- (3) Need for Consumer Protection.
- (4) Types of Consumer's Exploitation.
- (5) Importance of Consumer Awareness and Methods of Consumer Protection.
- (6) Basic Concepts under the Consumer Protection Act(Consumer, Complaint, Class Complaint, Persons who can file a complaint, period for filing complaint.)
- (7) Procedure for filing a complaint.
- (8) Remedies available to a Consumer.
- (9) Rights and Duties of a Consumer.
- (10) Machinery for Redressal of Consumers' Grievances.
- (11) Questionnaire [for at least 10 Customers with their passport size photograph, Signature, Address & Mobile No. and your Photograph with the customers in the locality should be pasted inside your file (Date and time must be mentioned on it)]
- (12) Write your findings with Conclusion.

**COMMERCE**

**[SEQUENCE:- Name, Contents, Acknowledgement, Introduction of Project Work- All the topics to be mentioned, Objectives of Project Work, Detailed matter, Conclusion, Bibliography]**

**TOPIC-I**

Contact an insurance agent and collect information about 5 different types of life insurance policies provided by Life Insurance Corporation or any other different companies for an amount of Rs. 1,00,000/-. Include information as per details given below for every insurance plan and make a comparative analysis.

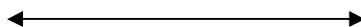
- (1) Premium of insurance.
- (2) Terms of inclusions and exclusions of each policy.
- (3) Term of the policy.
- (4) Withdrawal of money from the insurance scheme( surrender/ foreclosure)
- (5) Advantages/disadvantages of the plan.

Prepare a report on your findings and give the meaning of Insurance and explain principles of insurance also.

Your one passport size photograph in school uniform should be pasted on the cover page of the file.

**TOPIC-II**

Study the BPO and KPO industry in India. Collect newspaper/magazine/internet articles on BPOs and KPOs. Explain the position of your country in these industries. Make a Power Point Presentation on it and copy the same in the "Smart Class" for Class-XI.



**ACCOUNTS**

**[SEQUENCE:- Name, Contents, Acknowledgement, Introduction of Project Work- All the topics to be mentioned, Objectives of Project Work, Detailed matter, Conclusion, Bibliography]**

- Topic I** Preparation of Journal / Sub-division of journal, Ledger, Trial Balance and Financial Statements of a trading organisation on the basis of a case study.
- (i) Develop a case study of a sole trader starting business with a certain amount of capital. He could have got the amount from his past savings or by borrowing from a bank by mortgaging his personal assets or by winning a lottery or any other source.
  - (ii) Write in detail, his transactions during the year- his purchases - cash and credit, sales- cash and credit, expenses, purchase of fixed assets and depreciation charged on them, any outstanding expenses, prepaid expenses, accrued income, drawing bills of exchange, accepting bills payable, etc.
  - (iii) From this case study developed (which should have at least 15 transactions), pass the journal entries, post them into the ledger, prepare a Trial Balance and the Trading and Profit and Loss Account and Balance Sheet.
  - (iv) The various expenses for comparison purposes, could be depicted in the form of bar diagrams and pie charts.

- Topic II** Prepare a Bank Reconciliation Statement and Amended Cash Book from the information given in your Cash Book and Bank Statement (Pass Book) with at least fifteen transactions. Your one passport size photograph in school uniform should be pasted on the cover page of the file.

**PHYSICAL EDUCATION**

Prepare a project file on any two games under following heads

- 1- Brief history
- 2- Interpretation of laws
- 3- Duties and responsibilities of officials and captain of team.
- 4- Measurement and dimensions related to games
- 5- Terminology related to games.
- 6- Rules and Regulations
- 7- Strategies and formation (with diagrams)
- 8- Equipments with diagrams and dimensions of play.
- 9- Governing bodies at national and international level.
- 10- Major abbreviations related to games
- 11- Tournaments and trophy.

**S.U.P.W**

- 1- File Work

Write on the following topics:

- (a) Clothing and Textile
- (b) Health and Hygiene
- (c) Electrical Gadgets

- 2- Community Service:

Awareness drive on 'Health and Nutrition Education'. Students are required to visit the orphanage and guide the children about their health and nutritional requirement. Students will take handmade charts to guide the children.

- 3- Project

Students are required to prepare six table mats using fabric colours.

