## HARI VIDYA BHAWAN

## HOLIDAY HOMEWORK SUBJECT-ENGLISH <br> CLASS-X <br> SESSION:2021-22

General Instructions-
$>$ Students, you can do your Holiday Homework in A-4 size or loose sheets whichever is available at home.
$>$ Assessment will be based on the following parameters:
$>$ Content, Presentation and Creativity.
$>$ Insert all the sheets in a folder

## Writing Skills

Q1. Use your imagination and write an amazing story of about 200 words based on given outlines:

Beach -friends-seafood -poor boy - rescued -cool-party-shells

Q2. You are Anaya/Aryan. You took part in a medical camp organized in a remote village in Delhi by the Health Club of your school. You were surprised to find that most of the people there had no awareness about maintaining personal hygiene. Write a letter to the Editor of a national daily in about 150-200 words, expressing your concern and encouraging youngsters to initiate such campaigns in order to spread awareness about health and hygiene.

## Literature

A. Learn the following chapters from 'First flight'-

1. A letter to God
2. Dust of Snow
3. Nelson Mandela-Long walk to Freedom
4. Two Stories about Flying (ONLY READ)
5. Fire and Ice (ONLY READ)
B. Learn the following chapter from 'Footprints without Feet'-
6. A Triumph of Surgery

## Art Integrated Learning (AIL) Activity

(Do any two)

1. Role Play- Imagine you are Lencho from the story "A Letter to God". Record a video highlighting a character sketch of Lencho.
2. Make a short video throwing light on the biography of your favourite Freedom Fighter.
3. Make a short video presenting a model using different forms of Tenses and Modals.

# हरि विद्या भवन <br> कक्षा :- दसवी <br> सत्र :- 2021-22 <br> विषय- हिंदी 

ग्रीष्म -अवकाश कार्य
सामान्य निर्देश-नीचे दिया गया कार्य अपनी व्याकरण की कॉपी में करिएप्रश्न 1 .प्रधानाचार्य को अपनी कक्षा की खूबियां बताते हुए पत्र लिखिए।

प्रश्न-2. आप अपने विद्यालय की वाद -विवाद प्रतियोगिता में भाग लेना चाहते हैं। इस प्रार्थना के साथ अपने प्रधानाचार्य को पत्र लिखिए।

प्रश्न-3 आयुर्वेदिक चवनप्राश का विज्ञापन बनाइए।
प्रश्न-4. आपके शहर में ऊनी कपड़ों की सेल लगी है इसके लिए एक विज्ञापन तैयार कीजिए।

प्रश्न-5.नीचे दिए गए विषयों में संकेत बिंदु के आधार पर 80 से 100 शब्दों में अनुच्छेद लिखिए-
(1) विज्ञान के लाभ:

संकेत- बिंदु: विकास में विज्ञान का योगदान, वैज्ञानिक आविष्कारों के लाभ और हानियां, विज्ञान का संतुलित प्रयोग।
(2) स्री शिक्षा:

संकेत- बिंदु: आवश्यकता, बढ़ते आंकड़े, शिक्षा का महत्व, कुछ स्थान।

## क्रियाकलाप (activity)

नीचे दिए गए प्रस्थान बिंदुओं के आधार पर एक लघु कथा तैयार कीजिए। आप इस कार्य को एक फाइल फोल्डर में तैयार कर सकते हैं चित्र के साथ। यह चित्र आप ड्राइंग के द्वारा भी दर्शा सकते हैं। यह चित्र कहानी के आधार पर होना चाहिए ।
(1) एक लकड़हारा नदी के किनारे स्थित एक पेड़ पर चढ़कर लकड़ियां काट रहा था ।लकड़ी काटते समय कुल्हाड़ी उसके हाथ से छूटकर नदी में गिर गई।
(2) नदी के किनारे जामुन के एक पेड़ पर एक बंदर रहता था। नदी में रहने वाला एक मगरमच्छ उसका मित्र था।
(3) एक दिन जंगल में भारी वर्षा हुई जिससे पशु पक्षी काफी परेशान थे।
(4) लॉकडाउन के दौरान कुछ मजदूर सड़क के किनारे एक पेड़ के नीचे भूखे प्यासे बैठे थे।
(5) कृष्ण पांडवों की ओर से जब संधि का प्रस्ताव लेकर हस्तिनापुर गए तो वह प्रस्ताव दुर्योधन की हठ से भी विफल हो गया।

## ए.आई.एल एक्टिविटी

(1) कबीरदास जी का जीवन परिचय के साथ उनके दोहो का वाचन करते हुए अपना वीडियो बनाइए।

अथवा
(2) पाठ्यपुस्तक के अंतर्गत किसी पाठ का चरित्र चित्रण (ROLE PLAY) कीजिए । अथवा
(3) मीरा के पद के अंतर्गत आए पदों का वाचन करते हुए अपना वीडियो बनाइए। लिंकन पर क्लिक करें :- https://youtu.be/chsYTbe5-n4

ऊपर दिए गए क्रियाकलाप को आप सामूहिक क्रियाकलाप(GROUP ACTIVITIES) के अंतर्गत भी कर सकते हैं।

# HARI VIDYA BHAWAN <br> HOLIDAY HOMEWORK SUBJECT-INFORMATION TECHNOLOGY <br> CLASS-X <br> SESSION:2021-22 

## General Instructions

Students, you can do your Holiday Homework in A- 4 size or loose sheets whichever available at home.
$>$ Assessment will be based on the following parameters:
$>$ Content, Presentation and Creativity.
$>$ Insert all the sheets in a folder

## Chapter reading

1. Read Unit -1 Communication Skills.
2. Learn all the worksheets sent until now.

## Activity Time

1. Make a project file on - Demonstrate basic writing skills Or Communication cycle and importance of feedback

## Art integrated learning (AIL) activity

(Do any two)
2. Record video presenting Communication skills and its types (Verbal, Non-Verbal and Visual).
3. Make a video of conducting an Interview.(You can also take the help of your family members).
4. How can you overcome the barriers of Effective Communication, display it with a self-made video.

# HARI VIDYA BHAWAN <br> HOLIDAY HOMEWORK <br> SUBJECT - MATHEMATICS <br> CLASS - X <br> SESSION - (2021-22) 

Instruction: Do these practice Questions from (CH-1,2,3 \& 4) in your fair notebook.

1. The pair of equations $x+2 y-5=0$ and $-3 x-6 y+15=0$ have:
(A) A unique solution
(B) Exactly two solutions
(C) Infinitely many solutions
(D) No solution
2. Which of the following pair of linear equation is consistent?
(A) $x+5=5,2 x+2 y=10$
(B) $x-y=8,3 x-3 y=16$
(C) $2 x+6 y-6=0,4 x-12 y=0$
(D) $2 x-2 y-2=0,4 x-4 y-5=0$
3. Meena went to a bank to withdraw Rs.2,000. She asked the cashier to give her Rs. 50 and Rs. 100 notes only. Meena got 25 notes in all. Find how many notes of Rs. 50 and Rs. 100 she received.
4. $\mathrm{N}^{2}-1$ is divisible by 8 , if n is
(A) an integer
(B) a natural number
(C) an odd integer
(D) an even integer
5. The product of a non-zero rational and an irrational number is
(A) always irrational
(B) always rational
(C) rational or irrational
(D) one
6. The numbers 525 and 3000 are both divisible only by $3,5,15,25$ and 75 . What isHCF $(525,3000)$ ? Justify your answer.
7. Prove $\sqrt{ } 11$ is an Irrational number.
8. The zeroes of the quadratic polynomial $x^{2}+99 x+127$ are
(A) both positive
(B) both negative
(C) one positive and one negative
(D) both equal
9. If one of the zeroes of a quadratic polynomial of the form $\mathrm{x} 2+\mathrm{ax}+\mathrm{b}$ is the negative of the other, then it
(A) has no linear term and the constant term is negative.
(B) has no linear term and the constant term is positive.
(C) can have a linear term but the constant term is negative.
(D) can have a linear term but the constant term is positive.
10. Find $k$ so that $x^{2}+2 x+k$ is a factor of $2 x^{4}+x^{3}-14 x^{2}+5 x+6$. Also find all the zeroes of the two polynomials.
11. Find the roots of $4 x^{2}+3 x+5=0$ by the method of completing the squares.
12. Find the value of $m$ so that the quadratic equation $m x(x-7)+49=0$ has two equal roots.
13. Solve the quadratic equation $2 x^{2}+a x-a^{2}=0$ for $x$.
14. Sum of the areas of two squares is $400 \mathrm{~cm}^{2}$. If the difference of their perimeters is 16 cm , find the sides of the two squares.
15. The diagonal of a rectangular field is 16 metres more than the shorter side. If the longer side is 14 metres more than the shorter side, then find the lengths of the sides of the field.
16. A motorboat covers a distance of 16 km upstream and 24 km downstream in 6 hours. In the same time it covers a distance of 12 km upstream and 36 km downstream. Find the speed of the boat in still water and that of the stream.
17. The perimeter of a right triangle is 60 cm . Its hypotenuse is 25 cm . Find the area of the triangle.
18. A lending library has a fixed charge for the first three days and an additional charge for each day thereafter. Saritha paid Rs. 27 for a book kept for seven days, while Susy paid Rs. 21 for the book she kept for five days. Find the fixed charge and the charge for each extra day.
19. Five years ago, A was thrice as old as B and ten years later, A shall be twice as old as B. What are the present ages of $A$ and $B$ ?
20. Draw the graph of the equations $x-y+1=0$ and $3 x+2 y-12=0$. Determine the coordinates of the vertices of the triangle formed by these lines and the x -axis, and shade the triangular region.

## Activity Time

## 21. Complete following Activities in Math's lab manual.

Activity 1: To find HCF of two numbers experimentally based on Euclid's division Lemma.
Activity 2: To draw the graph of quadratic polynomial and observe.
(i) the shape of curve when the coefficient of $x^{2}$ is positive.
(ii) the shape of curve when the coefficient of $\mathrm{x}^{2}$ is negative.
(iii) its number of zeroes.

Activity 3: To obtain the condition for consistency or inconsistency of given pair of linear equations in two variables by graphical method.
22. Click photos of things around you which resembles shapes given below (two photos each) and make a collage of it.


## AIL (Art Integrated Learning) Activity <br> (Do any two))

1) Make a short video of throwing light on the biography of a famous mathematician you like the most. (note: you can use any editing software/application)
2) Make a 3D model on any topic of mathematics and record the video of the process of making it.
3) Make a 3D Hermit Crab by Constructing Square Root Spiral and record the video of the process of making it. For reference watch video in link given below.
Click on link: https://www.youtube.com/watch?v=D_hYGbWE3CA

## Riddle-Time

## 1. Two Fathers and Two Sons Riddle

Two fathers and two sons sat down to eat eggs for breakfast. They ate exactly three eggs, each person had an egg. The riddle is for you to explain how.

## 2. Digit Frequency

Part I. What digit is the most frequent between the numbers 1 and 1,000 (inclusive)? To solve this riddle you don't want to manually do all of the math but rather try to figure out a pattern.

## 3. The cards

A small number of cards has been lost from a complete pack. If I deal among four people, three cards remain. If I deal among three people, two remain and if I deal among five people, two cards remain. How many cards are there?

## 4. Two by two

You know $2+2$ comes to the same as $2 \times 2$. Now find a set of three different whole numbers whose sum is equal to their total when multiplied.

NOTE: Try these riddles yourself first then visit below given link for solutions and more such riddles.
$>$ https://www.mathwarehouse.com/riddles/math-riddles.php
> https://www.rd.com/list/math-riddles/

# HARI VIDYA BHAWAN <br> HOLIDAY HOMEWORK 

Session-(2021-22)
Class - X
Subject-Science

## Instructions to be followed:

$>$ Students do your holiday homework in science practice notebook.
$>$ Neatness is the common parameter for the completion of work. Please maintain the quality of work done.
> Revise the topics covered in science till date.

## PHYSICS :

1. A thick wire and a thin wire the same material are successively connected to the same circuit to find their respective resistance. Which one will have lower resistance? Give reason.
2. An electric bulb is rated at $60 \mathrm{~W}, 240 \mathrm{~V}$. Calculate its resistance. If the voltage drops to 192 V. calculate the power consumed and the current drawn by the bulb. (Assume that the resistance of the bulb remain unchanged.)
3. The resistance of a wire of 0.01 cm radius is $10 \Omega$. If the resistivity of the material of the wire is $50 \times 10^{-8} \mathrm{ohm}$ meters, find the length of the wire.
4. One day sohan went to his friend's house. He was surprised to see that most of the electrical appliances at his house were functional. For example tube light and fan in all room, two TV's, computer, light of toilet \& kitchen were switched on sohan told his friend that this is not the way to use electricity. Now the question arises whether this habit of consuming electrical energy is acceptable or not. Will it not effect like economical condition of family as well as the nation how?
5. We can draw the circuit as shown below:


Find out the total current .

## Let's do the activity

Activity 1: Observe the different devices at home and note down their power and required electric current.

Activity 2: Draw the schematic diagram of a circuit consisting of a battery of four cells of 1.5 V each, an ammeter and a plug key all connected in series.

## BIOLOGY:

1. What will be impact on ecosystem if bacteria and fungi are removed from the environment? Explain.
2. Construct an terrestrial food chain showing four trophic levels.
3. Which level shows the maximum biological magnification and why?

4. In the following food chain, plants provide 500 J of energy to rats. How much energy will be available to hawks from snakes?

$$
\text { Plants } \rightarrow \text { Rats } \rightarrow \text { Snakes } \rightarrow \text { Hawks }
$$

5. Plastic production is increasing day by day in spite of the fact that plastic is harmful for the environment.
Based on the above statement answer the following:
(a) What are the harmful effects of plastic usage?
(b) In our day to day situation what are the alternatives that we can use instead of plastics.

## Let's do the activity

Activity 1: Prepare a puzzle games on the following chapter:

- Our Environment


## CHEMISTRY:

1. A copper coin is kept in a solution of silver nitrate for some time, what will happen to the coin and the colour of the solution?
2. What happens when $\mathrm{CO}_{2}$ gas is passed through lime water and why does it disappear on passing excess $\mathrm{CO}_{2}$ ?
3. Observe the diagram given below carefully and answer the questions that follow:

(i) Iron nails dipped in copper sulphate solution. After ten minutes of keeping the set up as shown in the figure, the colour of the iron nail changes, what does this indicate?
(ii) Name the type of chemical reaction that takes place between copper sulphate and iron nail.
(iii) Which of the two metals involved in the given process is more reactive?
(iv) What change do you expect in the reaction mixture if a copper wire is kept immersed in an iron sulphate solution?
(v) Write a balanced chemical equation for the reaction, between copper sulphate and iron
4. In the following redox reaction, name oxidizing agent, reducing agent, substance oxidized, substance reduced.
(i) $2 \mathrm{Mg}+\mathrm{O}_{2} \rightarrow 2 \mathrm{MgO}$
(ii) $\mathrm{Fe}_{3} \mathrm{O}_{4}+\mathrm{Cl}_{2} \rightarrow 3 \mathrm{Fe}+4 \mathrm{H}_{2} \mathrm{O}$
(iii) $\mathrm{SO}_{2}+2 \mathrm{H}_{2} \mathrm{~S} \rightarrow 2 \mathrm{H}_{2} \mathrm{O}+\mathrm{S}$
(iv) $\mathrm{Zn}+2 \mathrm{HCl} \rightarrow \mathrm{ZnCl}_{2}+\mathrm{H}_{2}$
(v) $4 \mathrm{NH}_{3}+5 \mathrm{O}_{2} \rightarrow 4 \mathrm{NO}+6 \mathrm{H}_{2} \mathrm{O}$
5. Mohan was working in a factory. He purchased a new cycle but kept it in the open. After two
months he found that the cycle chain and even the handles got rusted. His friend advised him to apply a coating of rust proof paint to the cycle and not to keep it in the open in future.
(i) Why was the cycle rusted ?
(ii) What is the role of rust proof paint?
(iii)What values are associated with this gesture ?

## Let's do the activity

## Activity 1: Complete following Activities in Science lab manual.

Experiment 3: Performing and observing the following reactions and classifying them into
(a) Combination reaction
(b) Decombination reaction
(c) Displacement reaction
(d) Double displacement reaction
(i)Action of water on quick lime
(ii)Action of heat on ferrous sulphate crystal
(iii) Iron nails kept in copper sulphate solution
(iv) Reaction between sodium sulphate and barium chloride solutions.

## CHEMICAL REACTIONS CROSSWORD



## Across

3) Reaction that takes in energy in the form of heat
4) Factor affecting the rate of reactions
5) Reaction that gives out energy in the form of heat
6) Gain of oxygen by a substance during a chemical reaction
7) Substance which slows down or stops a chemical reaction
8) Substance that participates in a chemical reaction
9) Chemical reaction in which a single compound breaks down into two or more elements or compounds

## Down

1) Reaction between an acid and base forming water and salts
2) Solid that forms from a solution during a chemical reaction
3) Reaction in which one element replaces another within a compound
4) Substance formed as a result of a chemical reaction
5) .... energy is the energy needed to start a reaction
6) Substance that speeds up a reaction without being consumed
7) Chemical link that holds molecules together

## AIL (Art Integrated Learning) Activity

(Do any two))

1) Make a model of the following and make a short video of the process of making it .
(a) Make an electric circuit by using a battery, conducting wire, bulb and switch. Observe the materials present at home and segregate them as conductors and insulators by using circuit made
2) Make a model ( you can make working model also ) on any topic of the following and record the video of the process of making it. ( any one )
(a) Digestive system
(b) Excretory system
(c) Circulatory system
(d) Respiratory system
3) Make a PowerPoint presentation or short video on any topic of science of your syllabus or you can choose from the following topic ( any one ) :
(a) Concept of corrosion,conditions require and methods to prevent it
(b) Ozone depletion
(c) Different forms of energy
(d) Biogas plant
(e) Atmospheric refraction
(f) Magnetism

## Note:

- Model should be eco-friendly and light weight.
- Use cardboard in the place of thermocol, if required.
- No polythene should be used.
- Video limit should be maximum of 3-4 minutes.
- Any editing software can use for the editing of video.


## HARI VIDYA BHAWAN

## HOLIDAY HOMEWORK

## SUBJECT- SOCIAL SCIENCE

SESSION - 2021-22
CLASS - X

## General Instructions: -

- Learn all questions and do in your notebook.
- Do Map Work in your notebook.


## SHORT QUESTIONS

Q1. What is the other name for Napoleonic code? Write any four changes brought by this.

Q2. Explain the Unification of Germany, Britain and Italy.
Q3. Briefly explain Balkan Issue.
Q4. Write a short note on:-
$>$ Giuseppe Mazzini
$>$ Count Camillo de Cavour
> Giuseppe Garibaldi
Q5. What do resources mean?
Q6. Define the term soil erosion? What are the different types of soil erosion?
Q7. Explain with a diagram how nature, technology and institutions are interdependent.

Q8. Distinguish between biotic and abiotic resources.
Q9. Distinguish between Bangar and Khadar soils.
Q10. What is the ethnic composition of Belgium?
Q11. Why is power sharing desirable?

## LONG QUESTIONS

Q1. "This sense of collectively belonging came party through the experience of united struggles role of folklore, songs, icons and images" Analyse the statement.

Q2. Examine the role of women in the nationalist struggles of Europe.
Q4. Describe any two important characteristics of each type of soil available in India.

Q5. Explain the classification of resources.
Q6. What are the different forms of power sharing in modern democracies? Give an example of each of these.

Q7. What was the reason of the civil war in Sri Lanka? What was its impact on the country?

Q8. Distinguish between National Income and Per Capita Income.
Q9. Distinguish between Developed countries and Developing countries.

## MAP WORK (GEOGRAPHY)

CH-1 Resources and Development
(Outline Political Map of India) (Identification only)
Major Soil Types: - Alluvial Soil
Black Soil
Laterite Soil
Red and Yellow soil
Arid Soil
Forest Soil

## AIL (Art Integrated Learning) Activity

## General Instructions: -

Do any ONE topic.
$>$ Make a Short Video on the topic.
$>$ Prepare a Handbook on the topic (Min 10 pages)
$>$ It should be hand written by the students themselves and use eco-friendly products without incurring too much expenditure.
> Project file should be decorative.
> You can use newspaper clippings, maps, diagrams and material from the web.
$>$ The cover page should be written in bold letters with the Topic, Name of the Student, Class and Admission Number.
$>$ You can choose any topic which is given below.

## TOPICS OF THE PROJECT: -

1. Sustainable Development
2. Save Water
3. Lifelines of National Economy
4. Democracy
5. Political Parties
6. Sectors of the Indian Economy
7. Globalisation

Note:- To get some knowledge about activity, click on the given link :-

## https://youtu.be/LAs-09aEcXo

https://youtu.be/wQHJxgwv9L4

