

ADARSH PUBLIC SCHOOL

HOLIDAYS' ASSIGNMENT

SESSION 2019-20

CLASS-X

INSTRUCTIONS :

- Do the work in respective notebooks.
- Revise the syllabus for Pre Mid Assessment covered so far.

ENGLISH

1. Refer site : my CBSE guide.com class X and download the same application. Do question number 1 and 2 (based on Section – A Reading.) Question number 3 and 4 (based on Section – B – Writing Skills.) Question number 5,6 and 7 (based on Grammar).

<https://mycbseguide.com/downloads/getcontentfile/10241>

2. Read chapter 3 and 4 (First Flight). Make two RTC's each from them and write the relevant questions and their answers respectively.

3. ARTICLE WRITING

- (a) You are Arjun / Arjuna of class X. You believe honesty is the best policy for earning livelihood. Write an article titled, 'Honest Means of Livelihood'.
- (b) In the Zoo at Lusaka, Zambia, there is a cage where the notice reads, "The world's most dangerous animal." Inside the cage there is no animal but a mirror where one sees oneself. Man has been cruel to all species. Write an article on the topic. 'Cruelty to Animals'.
- (c) Humility is something that costs nothing but yields handsome returns. Write an article on the topic. – 'Significance of Humility'.

4. SHORT STORY

- (a) Rehana wanted to write a short story. However, she could not go beyond a few lines. Taking help from the information given below, develop Rehana's story to a logical conclusion.

It was 9:00 am. I was waiting at the bus stand waiting for the bus that could drop me

- (b) Write a short story on the basis of the beginning given below :

There was a learned Brahmin who lived at the outskirts of a city with his wife Shandilin. They were a happy couple but they were poor.....

5. LETTER WRITING

- (a) Write a letter to the Editor of a local daily complaining about the lawlessness and chaos prevailing in your area.
- (b) You bought a Giant Whirlpool Refrigerator of 300 litres from Sunder Electronics, Mall Road, Karnal within a month, you found that the freezing section of the refrigerator was not giving a satisfactory working. Write a letter to the dealer complaining about it and ask him to replace the defective refrigerator at the earliest.

6. Write an essay in about 300-500 words on 'SOUTH KOREA-My Favourite Destination' for an International Essay Writing Competition. Only the selected entries will be further considered for participation.

हिन्दी

I. 1. निम्नलिखित विषयों पर अनुच्छेद लिखिए ।

- क. सूचना क्रांति ख. लोकतंत्र और चुनाव ग. पेड़ - पौधे और हम
घ. बिना विचारों जो करै, सो पाछे पछताय

II . क. नई सरकार से जनता की उम्मीदों को लेकर दो व्यक्तियों के बीच हुई वार्तालाप को लिपिबद्ध कीजिए ।

- ख. बोर्ड की परीक्षा में अच्छे अंक आने पर दो छात्रों की प्रसन्नता संवाद रूप में लिखिए ।
ग. भारत की क्रिकेट टीम के प्रदर्शन के विषय में दो मित्रों के मध्य संवाद लिखिए ।
घ. बढ़ती बेरोजगारी की समस्या पर दो युवकों के बीच संवाद लिखिए ।

III. 1. बिजली की अनियमित आपूर्ति की शिकायत करते हुए विद्युत विभाग के अधिकारी को पत्र लिखिए ।

2. सार्वजनिक स्थलों पर विज्ञापन लिखने को रुकवाने के लिए नगर निगम अधिकारी को पत्र लिखिए ।
3. अपने क्षेत्र की समस्याओं और सुविधाओं की ओर ध्यान आकर्षित करते हुए अपने क्षेत्र के संसद सदस्य को पत्र लिखकर उन्हें दूर करने का अनुरोध कीजिए ।
4. आपके विद्यालय में वृक्षारोपण समारोह का आयोजन हुआ था । जिसमें आपने भी सक्रिय योगदान दिया था । अपने अनुभव बताते हुए बड़े भाई को पत्र लिखिए ।

IV. 1. आप अपना पुराना मकान बेचना चाहते हैं । जिसके लिए विज्ञापन तैयार कीजिए ।

2. 'बिजली बचाओ' अभियान के लिए एक प्रदर्शित विज्ञापन तैयार कीजिए ।
3. 'टैल्कम पाउडर' हेतु विज्ञापन तैयार कीजिए ।
4. बाज़ार में 'शक्ति के नाम से गेहूँ का उत्कृष्ट तथा शुद्ध आटा आया है । उसकी गुणवत्ता का उल्लेख करते हुए एक विज्ञापन तैयार कीजिए ।

V. 1. अ.ब.स. स्कूल, दिल्ली के साहित्य विभाग के अध्यक्ष की ओर से छात्रों को अगले माह आयोजित होने वाली वाद-विवाद प्रतियोगिता की सूचना दीजिए ।

2. आगामी सप्ताह में किसी एक दिन 6 घंटे के लिए बिजली आपूर्ति बाधित रहेगी । दिन, समय, कारण का उल्लेख करते हुए सूचना लिखिए ।
3. आप अपना नाम बदलना चाहते हैं । इस हेतु समाचार-पत्र में देने के लिए सूचना तैयार कीजिए ।
4. आप अपने विद्यालय के सांस्कृतिक प्रतिनिधि हैं । दिल्ली प्रकाशन मंडल की ओर से विद्यालय में आयोजित किए जाने वाले पुस्तक मेले की जानकारी देने के लिए सूचना लिखिए ।

VI. पूर्व पठित पाठों को कठस्थ कीजिए ।

MATHEMATICS

1. Find the zeroes of the following polynomials by factorization method and verify the relation between the zeroes and the coefficients of the polynomials.

- (a) $4x^2 - 3x - 1$ (b) $2x^2 + \frac{7}{2}x + \frac{3}{4}$ (c) $2x^2 - (1 + 2\sqrt{2})x + \sqrt{2}$
(d) $y^2 + \frac{3}{2}\sqrt{5}y - 5$ (e) $y^2 + 4\sqrt{3}y - 15$

2. Given that $\sqrt{2}$ is zero of the polynomial $6x^3 + \sqrt{2}x^2 - 10x - 4\sqrt{2}$, find its other two zeroes.

3. Given that $x - \sqrt{5}$ is a factor of the cubic polynomial $x^3 - 3\sqrt{5}x^2 + 13x - 3\sqrt{5}$. Find all the zeroes of the polynomial.

4. For which values of a and b are the zeroes of $q(x) = x^3 + 2x^2 + a$ also the zeroes of the polynomial $(x) = x^5 - x^4 - 4x^3 + 3x^2 + 3x + b$? Which zeroes of p(x) are not the zeroes of q(x) ?

5. For which value(s) of λ , do the pair of linear equations $\lambda x + y = \lambda^2$ and $x + \lambda y = 1$ have
 (a) no solution ? (b) infinitely many solutions ? (c) a unique solution ?
6. Find the values(s) of p for the following pair of equations :
 (a) $-3x - 5y = 7$ and $2px - 3y = 1$, if the lines represented by these equations are intersecting.
 (b) $3x - y - 5 = 0$ and $6x - 2y - p = 0$
 if the lines represented by these equations are parallel.
 (c) $-x + py = 1$ and $2PX - 3Y = 1$
 if the pair of equations has no solutions.
7. Find the value of p and q for given pair of equations $2x + 3y = 7$, $2px + py = 28 - qy$ if the pair of equations have infinitely many solutions.
8. Two straight paths are represented by the equations $x - 3y = 2$ and $-2x + 6y = 5$. Check whether the paths cross each other or not.
9. If $2x + y = 23$ and $4x - y = 19$, find the values of $5y - 2x$ and $\frac{y}{x} - 2$.
10. Solve the following pairs of equations :
- | | | |
|---|-----------------------------|---------------------------------------|
| (a) $\frac{x}{3} + \frac{y}{4} = 4$. | (b) $4x + \frac{6}{y} = 15$ | (c) $\frac{1}{2x} - \frac{1}{y} = -1$ |
| $\frac{5x}{6} - \frac{y}{8} = 4$ | $6x - \frac{8}{y} = 14$ | $\frac{1}{x} + \frac{1}{2y} = 8$ |
| (d) $\frac{x}{a} + \frac{y}{b} = a + b$ | (e) $43x + 67y - 24$ | (f) $\frac{2xy}{x+y} = \frac{3}{2}$ |
| $\frac{x}{a^2} + \frac{y}{b^2} = 2$ | $67x + 43y = 24$ | $\frac{xy}{2x-y} = \frac{3}{10}$ |
11. Draw the graph of the pair of equations $2x + y = 4$ and $2x - y = 4$. Write the vertices of the triangle formed by these lines and the y -axis. Also find the area of this triangle.
12. Write an equation of a line passing through the point representing solutions of the pair of linear equations $x + y = 2$ and $2x - y = 1$. How many such lines can we find ?
13. Two years ago, Salim was thrice as old as his daughter and six years later, he will be four years older than twice her age. How old are they now ?
14. Two numbers are in the ratio 5:6. If 8 is subtracted from each of the numbers the ratio becomes 4:5. Find the numbers.
15. Graphically solve the following pair of equations :
 $2x + y = 6$ $2x - y + 2 = 0$
 Find the ratio of the areas of the two triangles formed by these lines with x - axis and with y - axis.
16. Determine graphically the vertices of triangle formed by the lines
 $y = x$, $3y = x$, $x + y = 8$
17. Draw the graphs of the equations $x=3$, $x=5$ and $2x-y-4=0$. Also find the area of the quadrilateral formed by the lines and x - axis.
18. Determine algebraically the vertices of the triangle formed by the lines
 $3x - y = 3$
 $2x - 3y = 2$
 $x + 2y = 8$
19. An integer is chosen between 0 and 100. What is the probability that it is divisible by 7.
20. A die has its six faces marked 0,1,1,1,6,6. Two such die are thrown together and the total score is recorded.
 (i) How many different scores are possible ?
 (ii) What is the probability getting a total of 7 ?
21. Card with numbers 2 to 101 are placed in a box. A card is selected at random. Find the probability that the card has
 (a) square number (b) cube number

22. All the jacks, queens and kings are removed from a deck of 52 playing cards. The remaining cards are well shuffled and then one card is drawn at random. Giving ace a value 1 similar value for other cards, find the probability the card has a value
(a) 7 (b) greater than 7 (c) less than 7
23. A coin is tossed three times. List the possible outcomes. Find the probability of getting
(a) all heads (b) at least 2 heads
24. To be familiar with the idea of probability of an event through double colour card experiment.

SCIENCE

Answer the following questions :

- Write balanced chemical equation mentioning the physical state of reactants and products formed for each of the following reactions.
 - Sodium metal reacts with water to produce sodium hydroxide and hydrogen gas.
 - Sodium chloride reacts with aqueous solution of silver nitrate to produce white precipitate of silver chloride and sodium nitrate.
 - Solution of barium chloride reacts with solution of sodium sulphate to produce barium sulphate and sodium chloride.
- Write chemical equation of double displacement reaction which is also a
 - Precipitation reaction
 - Neutralisation reaction.
- In the electrolysis of water
 - Name the gas collected at anode and cathode.
 - Why is the volume of gas collected at one electrode double than the other ?
 - What would happen if dilute sulphuric acid is not added to water.
- Define the term transpiration. Design an experiment to demonstrate the process of transpiration.
- With the help of activities show that chlorophyll, carbon dioxide and sunlight are necessary for photosynthesis.
- Explain how does respiration take place in plants.
- How do carbohydrates, proteins and fats get digested in human beings ?
- Explain the mechanism of Respiration.
- A man standing in front of a special mirror finds his image having a small face, big tummy and legs of normal size. What are the shapes of the three parts of the mirror ?
- A concave mirror is used as a head mirror by ENT specialists. The same mirror can also be used as a shaving mirror. Why ?
- How are power and focal length of a lens related ? You are provided with two lenses of focal lengths 20 cm and 40 cm respectively. Which lens will you use to obtain more convergent light ?
- A convex lens of focal length 20 cm can produce a magnified. Virtual as well as real image. Is this a correct statement ? If yes, where shall the objects be placed in each case for obtaining these images ?
- Illustrate the formation of diminished image by a convex lens and a concave lens.

14. What is meant by power of a lens ? Write its SI unit. A student uses a lens of focal, length 40 cm and another of -20 cm. Write the nature and power of each lens.

15. Solve the following numerical ;

(i) Find the size, nature and position of image formed when an object of size 1 cm is placed at a distance of 15 cm from a concave mirror of focal length 10 cm.

(ii) An object 2 cm high is placed at a distance of 16 cm from a concave mirror which produces a real image 3 cm high.

(a) What is the focal length of the mirror ?

(b) Find the position of the image.

(iii) An object 5 cm high is placed at a distance of 10 cm from a convex mirror of radius of curvature 30 cm. Find the nature, position and size of the image.

(iv) If an object of 7 cm height is placed at a distance of 12 cm from a convex lens of focal length 8 cm, find position, nature and height of the image.

(v) An object is placed at a distance of 50 cm from a concave lens of focal length 20 cm. Find the nature and position of the image.

II. Write down the practicals that have been performed (in the lab) in your practical files.

III. Revise the chapters chemical reactions and equations, life processes (Nutrition & Respiration) and light : Reflection and Refraction for Pre-mid Assessment.

IV. Make a working model on any one of the following themes given below :

(a) Resource Management

(b) Agriculture

(c) Health and Hygiene

(d) Transport and Communication

(e) Mathematical Modelling.

SOCIAL SCIENCE

I. Answer the following questions :

1. "Sustainability of development is a new area of knowledge". Do you agree ? Justify your answer.

2. Imagine if oil supplies get exhausted, how will this affect our life style ?

3. 'Relationship between nature, technology and institution teaches us important value' what is it.

4. What is indicated by large scale people's movement like Narmada Bachao Andolan, Chipko Movement and Project Tiger.

5. From your everyday experiences, write some ways on how you can conserve water ?

6. Why is conservation of water resources need of hour ? What are the judicious ways to conserve water resources ?

7. Explain the differences between horizontal power sharing and vertical power sharing.

8. What is common between Indian and Belgian form of power sharing arrangements ?

9. Can you identify three states names in 1947 that have changed later ? identify any three states which have been carved out of a bigger state in 2000.

10. What steps have been taken by the government to make the third tier more powerful and effective ?

II. Make a project on the topic – Consumer Rights In cooperating the following contents :

(a) Exploitation of Consumers in the market place.

(b) Consumer Protection Movement.

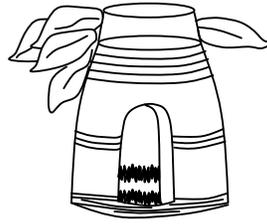
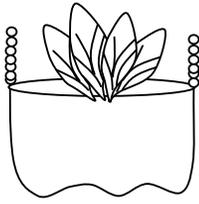
(c) Consumer Rights – All Rights to be explained in detail.

(d) Consumer Courts

The project should be developed properly including illustrations and data. It should not be more than 15 pages.

ART & CRAFT

1. Using a waste Plastic bottle of 5 lt. Make any useful Article like a Bird House.



2. Make a colourful Tribal Art Drawing like Madhubani Painting or WORLI art on A-3 size sheet.

Have a Fun-Filled Vacation !