# ARMY PUBLIC SCHOOL UDHAMPUR 

HOLIDAY HOMEWORK
SESSION [2024-2025]

## CLASS- IX

Your values are the things that you believe are important in the way you live .They (should) determine your priorities, and, deep down, they're probably the measures you use to tell if your life is turning out the way you want it to. When the things that you do and the way you behave match your values, life is usually good - you're satisfied and content. But when these don't align with your personal values, that's when things feel... wrong. This can be a real source of unhappiness. This is why making a conscious effort to identify your values is so important.

(The following case study questions, assertion -reason type questions and worksheet is required to be done on fair notebook of maths.)

## CASE STUDY QUESTIONS

Q 1:- Everyone in life, when he fulfils the responsibilities in their life, then they want to do something for the happiness and satisfaction of soul. To know about the charity and orphanages, a survey was conducted, it was found that 9 out of every 11 households are donating some amount
of their income to an orphanage or old age home or institutions for physically handicap. Then, answer the following questions:-
(i) Write the fraction of household which they are donating?
(ii) Write the fraction of households which are not donating?
(iii) Write the decimal form of fraction of the households, which are donat
(iv) Write the decimal form of fraction of the households, which are not donating?

Q 2. A SCHOOL PROVIDES FREE EDUCATION TO GIRL STUDENTS FROM WEAKER SECTIONS. THE LOCAL BODY OF A TOWN WANT TO OPEN THAT SCHOOL IN THE TOWN FOR WHICH A RECTANGULAR PLOT ABCD AS SHOWN IN THE FIGURE IS VERY SUITABLE. BUT THIS PLOT belongs to sohanlal. Sohanlal agrees to exchange it with triangular plotpar as SHOWN IN THE SAME FIGURE.

(I) . Write the coordinate of point B
(II). Write the coordinate of point D
(iII) Write the coordinates of point Q
(IV)Find the area (in SQ. units) of rectangle ABCD


Q3. Rajeev, a milkman, sell cow milk at the rate of Rs.50/L, buffalo milk at the rate of Rs. 60/L and goat milk at the rate of Rs. 70/L. If he sell $x$ L of cow milk. The quantity of buffalo milk is square of cow milk quantity. He sell only 10 L of goat milk.

On the above information, answer the following questions -
(i) Write a polynomial of the total cost of quantity?
(ii) Write a polynomial of total quantity?
(iii) What is the degree of polynomial of total cost of quantity?
(iv)If Rajeev can sell 10 L of cow milk in a day, then his total sale will be equal to

Q4:-Rohan decorated one of his bathroom walls with tiles as shown in the picture. He was having tiles of four colours orange, yellow, green and blue. He fitted the tiles in 8 columns and 12 rows. The size of 1 tile was 1 foot $x 1$ foot and the area of each tile is 1 foot $^{2}$. He arranged the tiles in such a way that the colour of tiles in each row and column were in the pattern :

Orange>>yellow>>green>>blue>>orange>>yellow>>green>>blue>>........


Now answer the following questions
(i) Which colour tile was fitted at the point with coordinates $(5,3)$ ?

Which colour tile was fitted at the point with coordinates $(2,5)$ ?
(ii) Which colour tile was fitted at the point with coordinates $(7,7)$ ?
(iii) What is the area of tiles fitted in rectangular part OABX?
(iv) What is the ordinate of top row tiles?

Q5.

## Read the Source/Text given below and answer any four questions:



Rohit was putting up one of his paintings in his living room. Before this Rohit had put a grid on the wall where each unit measured equal to a foot. The upper-left corner of the frame is at point $C(1,8)$ and the upper-right corner at $D(7,8)$. The bottom-left comer is at A $(1,2)$ and the bottom-right corner at $B(7,2)$.

## Please answer the following questions:

i. What is the width of the painting plus frame?
a. 5 Feet
b. 8 feet
c. 9 feet
c. 6 reet
ii. What is the length of the painting plus frame?
a. 9 feet
b. 8 feet
c. 6 feet
d. 5 feet
iii. Which sides of the painting are parallel to $x$-axis?
a. AB and CD
b. AC and ED
c. Diagonals AD and BC
c. No ane
iv. Which sides of the painuing are parallel to $y$-axis?
a. $A B$ ancicD
b. AC ancl BD

C Diagonals AC and BD
d. Na ane

Q6 Anil went to buy some vegetables, he bought ' $x$ ' kgs. of tomato and ' $y$ ' kgs. of potato. The total cost of vegetables comes out to be of Rs. 200. Now if the cost of 1 kg of tomato is Rs. 50 and 1 kg of potato is Rs. 20, then answer the following questions.
(a) Represent the total cost in the form of linear equation in two variables.
(ii) If Anil bought ' $x$ ' kgs of tomato and 2.5 kgs . of potato, then find the value of ' $x$ '.
(iii) If Anil bought ' 2 ' kgs of tomato and ' y ' kgs of potato, then find the value of ' y '.
(iv) The graph of $5 \mathrm{x}+2 \mathrm{y}=20$ cuts x -axis at which point.

Q7. An object which is thrown or projected into the air, subject to only the acceleration of gravity is called a projectile, and its path is called its trajectory. If the polynomial to represent the distance covered is,
$\mathrm{p}(\mathrm{t})=-5 \mathrm{t}^{2}+40 \mathrm{t}+1.2$
i.What is the degree of the given polynomial ?
ii. What is the coefficient of $t$ in the given polynomial?
iii. A polynomial having three terms is a
iv. A polynomial $\mathrm{p}(\mathrm{x})=2 \mathrm{x}+3 \mathrm{y}$ is a

Q8. Read the source/text carefully and answer the following questions :-


Real numbers are the numbers which include both rational and irrational numbers. Rational numbers are the numbers which can be written in the form of $p / q$ where $p$ and $q$ are integers and $q$ $\neq 0$. irrational numbers are those numbers which cannot be expressed in $\mathrm{p} / \mathrm{q}$ form or as ratio of two integers
i.Give two examples of irrational numbers.
ii. The product of two irrational numbers is
a. always irrational
b. always rational
c. both a and b
d. none of these
iii. Every integer is
a. rational number
b. whole number
c. natural number
d. even number
iv. How many rational numbers are there between the two rational numbers?

Q9. Deepak bought 3 notebooks and 2 pens for Rs. 80. His friend Ram said that price of each notebook could be Rs. 25. Then three notebooks would cost Rs.75, the two pens would cost Rs. 5 and each pen could be for Rs. 2.50.
(i)Form a linear equations in two variables from this situation by taking cost of one notebook as Rs. $x$ and cost of one pen as Rs. y.
(ii) Find a solution satisfying the equation formed in (i)?
(iii) How many solutions will be satisfying the linear equation formed in (i)?

Q10. Prime Minister's National Relief Fund (also called PMNRF in short) is the fund raised to provide support for people affected by natural and man-made disasters. Natural disasters that are covered under this include flood, cyclone, earthquake etc.


Two friends Sita and Gita, together contributed Rs. 200 towards Prime Minister's Relief Fund :
(a) Represent the above situation in linear equation in two variables?
(b) If Sita contributed Rs. 76, then how much was contributed by Gita?
(c) If both contributed equally, then how much is contributed by each?
(d) If both contributed equally, then how much is contributed by each?

Q11. Himanshu has made a project on real numbers, where he finely explained the applicability of exponential laws and divisibility conditions on real numbers. He also included some assessment questions at the end of his project as listed below. Answer them.
(i)For what value of $\mathrm{n}, 4^{\mathrm{n}}$ ends in 0 ?
(ii) The decimal expansion of rational and irrational numbers is $\qquad$ -
(iii) Every rational number is a real number. Justify the reason.
(iv)Express $0.5555 \ldots$ in $\mathrm{p} / \mathrm{q}$ form.

Q12. Beti Bacho, Beti Padho (BBBP) is a personal campaign of the Government of India that aims to generate awareness and improve the efficiency of welfare services intended for girls.
(i)In a school, group of $(x+y)$ teachers, $\left(x^{2}+y^{2}\right)$ girls and $\left(x^{3}+y^{3}\right)$ boys organsied a campaign on Beti Bachao, Beti Padhao. If in the group, there are 10 teachers and 58 girls, then what is the number of boys?
(ii) $(x-y)^{3}$ equals $\qquad$ ?
(iii) Which mathematical concept is used here?
(iv) $\mathrm{x}^{3}-\mathrm{y}^{3}$ equals $\qquad$ ?

Q13- The sides of a rectangular park are 80 m and 90 m respectively. A small triangular area of side $8 \mathrm{~m}, 10 \mathrm{~m}$ And 6 m respectively is to be left out at the four Corners of the park for growing flowering plants. The remaining area is be planted with natural Grass.
a) What is the area of the rectangular garden?
b) What is the semi-perimeter of the triangle For the above measurements?
c) Find the area used for growing flowering Plants.
d) Find the area of the grass to be planted


## ASSERTION REASON BASED OUESTIONS

Following questions are Assertion/Reason type questions. Each question has following four choices (a), (b), (c) and (d), only one of which is the correct answer. Mark the correct choice as follows -
a. Assertion is true, Reason is true; Reason is a correct explanation for the Assertion.
b. Assertion is true, Reason is true: Reason is not a correct explanation for the Assertion.
c. Assertion is true, Reason is false.
d. Assertion is false, Reason is true.
e. Both assertion and Reason are false.
1.Assertion :every whole number is not a natural number.

Reason: zero is whole number but not natural number.
2. Assertion: Every rational number is an integer.

Reason: $3 / 5$ is not an integer.
3. Assertion: $3 / 5$ is terminating decimal expansion

Reason : the remainder become zero.
4. Assertion: $y^{2}-5$ is a quadratic polynomial.

Reason: degree of polynomial 2 is called quadratic polynomial.
5. Assertion: a polynomial of degree 3 is called cubic polynomial.

Reason: $3 z^{3}-2 z^{2}+7 z+9$ is a cubic polynomial.
6. Assertion: Zeroes of polynomial $p(x)=x^{2}-3 x+2$ is 1

Reason:7x is the zero polynomial.
7. Assertion: The point $M$ lies in the IV quadrant. The coordinates of point $M$ are ( $a,-b$ )

Reason: The number of parts the coordinates axes divide the plane is four quadrant.
8. Assertion: the coordinate of origin are $(0,0)$

Reason : the distance from the $y$-axis is called y co-ordinate
9. Assertion: the coordinates describe the points in the plane uniquely.

Reason: in second quadrant $(\mathrm{x}, \mathrm{y})$ is $(+,+)$
10. Assertion: The linear equation $2 \mathrm{x}-5 \mathrm{y}=7$ has no solution.

Reason: The linear equation $3 x-y=x-1$ has unique solution.
11. Assertion: The graph of the linear equation $2 x+3 y=6$ cuts the $y$-axis at the point $(0,2)$

Reason: The equation $2 \mathrm{x}+5 \mathrm{y}=7$ has a unique solution, if $\mathrm{x}, \mathrm{y}$ are natural number.
12. Assertion: Solution of linear equation $2 x+0 . y+9=0$ is $(-9 / 2,0)$

Reason: Cost of book (x) exceeds twice the cost of pen (y) by Rs 10. This statement can be expressed as linear equation $x-2 y-10=0$


## WORKSHEET

Q.1. If both $a$ and $b$ are rational numbers, find the values of $a$ and $b$ in the following:-

$$
\frac{5+\sqrt{3}}{7-4 \sqrt{3}}=a+\sqrt{3} b
$$

Q.2. If both a and b are real numbers, then find the value of a and b in the following equality:
$\frac{\sqrt{2}+\sqrt{3}}{3 \sqrt{2}-2 \sqrt{3}}=a-b \sqrt{6}$
Q.3.Find two rational numbers between $-3 / 4 \& 4 / 5$.
Q.4. Express $0.575757_{---~_{-}}$in the form $\frac{p}{q}$, where $p$ and $q$ are integers.
Q.5.Simplify: $\quad(\sqrt{5}+\sqrt{2})^{2}$
Q.6. Simplify:

$$
\left[\left(\frac{81}{16}\right)^{\frac{-3}{4}} \times\left[\frac{25}{9}\right)^{\frac{-3}{2}} \div\left(\frac{5}{2}\right)^{-3}\right]
$$

Q. 7 Find the value of ' $a$ ' and ' $b$ '

$$
\frac{5+3 \sqrt{3}}{7+4 \sqrt{3}}=a+b \sqrt{3}
$$

Q.8. In which quadrant or on which axis each of the following points ( $-3,-5$ ), ( 0,0$),(2,3),(0,5),(3,0)$, $(-3,2)$, and ( $2,-3$ ) lie?
Q. 9 Check whether $\mathrm{g}(\mathrm{x})=x-3$ is a factor of $\mathrm{p}(\mathrm{x})=\mathrm{x}^{3}-4 \mathrm{x}^{2}+\mathrm{x}+6$ or not.
Q. 10 Represent $\sqrt{3}$ on the number line. Also give its justification.
Q.11. Find the value of $\frac{2^{0}+3^{0}-5^{0}}{2^{0} \times 3^{0} \times 5^{0}}$
Q.12. Plot the following ordered pairs of number $(x, y)$ as points in the Cartesian plane. Use the scale $1 \mathrm{~cm}=1$ unit on the axes.

| X | -2 | -1 | 0 | 1 | 2 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Y | 5 | 7 | -1.5 | 3 | -3 |

Q.13. Use factor theorem to determine whether $\mathrm{g}(\mathrm{x})=x-3$ is a factor of $p(x)=x^{3}-4 x^{2}+x+6$
Q.14. Find the value of the polynomial $p(x)=5 x^{2}-6 x+11$ when $x=-2$ and $x=3$
Q.15. Express $0.4 \overline{7}$ in the form of $\frac{p}{q}$, where p and q are integers and $\mathrm{q} \neq 0$
Q.16.Divide $3 x^{3}-4 x^{2}+5 x-3$ by $x+2$, and find the remainder and quotient.
Q.17.Plot the following ordered pairs of number $(x, y)$ as points in the Cartesian plane. Use the scale $1 \mathrm{~cm}=1$ unit on the axes.

| X | -3 | 0 | -1 | 4 | 2 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Y | 7 | 3.5 | -3 | 4 | -3 |

Q.18. Factorize each of the following by splitting the middle term :-
(b) $2 x^{2}+x-15$
(a) $x^{2}+11 x+10$
Q. 19 By using Factor theorem, show that $2 x+1$ is a factor of the polynomial $f(x)$ $=4 x^{3}+8 x^{2}-x-2$.
Q.20. Factorize the following :-
(a) $15 x^{2}+x-6$
(b) $x^{4}-y^{4}$
Q.21. Without actually calculating the cubes, find the value of $(-12)^{3}+(7)^{3}+(5)^{3}$
Q.22.Find the zero or root of the polynomial in each of the following cases:
(a) $f(x)=x-5$
(b) $g(x)=2 x+5$
(c) $f(x)=2 x$
Q.23. Linear equation $x-2=0$ is parallel to which axis?
Q. 24 . If $(1,-2)$ is a solution of the equation $2 x-y=p$, then find the value of $p$.
Q.25Express $4 x-3 y=-7$ in the form of $a x+b y+c=0$.
Q.26. The perimeter of a triangle is 60 cm . If its sides are in the ratio $1: 3: 2$, then its smallest side is -
Q.27. Find the value of $m$ if $(5,8)$ is a solution of the equation $11 x-2 y=3 m$, then find one more solution of this equation.
Q.28. On the graph paper draw the straight line $3 x-2 y=4$ and $x+y-3=0$. Also, find their point of intersection on the graph.
Q.29. Represent $2 x+3 y=6$ by a graph. Write the coordinates of the point where it meets:
(a) $x$-axis (b) $y$-axis
Q.30. The perimeter of an equilateral triangle is 48 cm . Find its area.

## Sub enrichment activity

## (All four activities To be done on Lab Manual)

1. To identify seat of a student on the seating plan in the form of Cartesian plan
2. To obtain a linear equation of a situation and draw a graph which represents the same.
3. Search of various historical aspects about Geometry and paste pictures.
4. Write down important facts about India Mathematicians and paste pictures.

## SUBJECT - HINDI

1. जून माह तक पढ़ाए गए पाठों को अच्छी तरह से याद करें।
2. व्याकरण कार्य-पत्रिका का कार्य हिंदी की अभ्यास पुस्तिका (FAIR NOTEBOOK) में करें।

## व्याकरण

प्र.(1) अनुस्वार चिहन के उचित प्रयोग वाला शब्द है-
(i) उड़ेलना (ii) जंगल (iii) अत्यन्त (iv) चूकि

प्र.(2) अनुनासिक चिहन के उचित प्रयोग वाला शब्द है-
(i) सँस्कार (ii) व्यंजन (iii) मुँह (iv) फूकना

प्र.(3) अनुनासिक चिहन के उचित प्रयोग वाला शब्द है-
(i) काटां (ii) कांटा (iii) काँटा (iv) काटा

प्र.(4) अनुस्वार चिहन का उचित प्रयोग वाला शब्द है-
(i) कुंडली (ii)दडित (iii) नीदं (iv) कहीं

प्र.(5) अनुनासिक चिहन का उचित प्रयोग वाला शब्द है-
(i) रंगीला (ii) मुँह (iii) दंड (iv) उत्तराँचल

प्र.(6) प्रगति शब्द में उपसर्ग -
(i) पर (ii) प्र (iii) गति (iv) प्राग

प्र.(7) ‘हमखयाल' में उचित उपसर्ग शब्द है-
(i) ख्याल (ii) हम (iii) हमख (iv) इसमें कुछ नहीं

प्र.(8) 'पौराणिक' में उचित प्रत्यय शब्द है-
(i) इक (ii) णिक (iii) ईक (iv) क

प्र.(9) ‘कामयाबी’ में उचित प्रत्यय है-
(i) आब (ii) ई (iii) आई (iv) कम

प्र.(10) ‘भिखारी को भोजन दो।’ अर्थ के आधार पर वाक्य है-
(i) विधान वाचक (ii) इच्छा वाचक (iii) निषेधवाचक (iv) आज्ञावाचक

प्र.(11) बच्चे निबन्ध लिख रहे होंगे- अर्थ के आधार पर वाक्य है-
(i) संकेतवाचक (ii) इच्छावाचक (iii) संदेहवाचक (iv) आजावाचक

प्र.(12) किसी के कथन को ज्यों का त्यों लिखने पर कौन -सा विराम चिहन लगाते हैं -
(i) योजक चिहन (ii) उद्धरण चिहन (iii)अल्प विराम (iv) पूर्ण विराम

## प्र.(13) वाक्य की समाप्ति पर कौन - सा चिहन लगाते हैं -

(i) पूर्ण विराम चिह्हन (ii) उद्धरण चिहन (iii) अर्द्ध विराम चिहन (iv) निर्देश चिह्नन

प्र.(14) किसी बड़े अंश का संक्षिप्त रूप दर्शाने के लिए किस चिहन का प्रयोग किया जाता है?
(i) अल्प विराम चिह्हन (ii) लाघव चिहन (iii) कोष्ठक चिहन (iv) अर्द्ध विराम चिह्हन

प्र.(15) 'मेरा आज बाहर खेलने का मन हो रहा है' अर्थ के आधार पर वाक्य है-
(i) विधानवाचक (ii) आज्ञावाचक
(iii) इच्छावाचक (iv) संदेहवाचक।

प्र.(16) ‘तुम यहाँ आओ’ अर्थ के आधार पर वाक्य है-
(i) विधानवाचक
(ii) आज्ञावाचक ।
(iii) संकेतवाचक
(iv) प्रश्नवाचक

प्र.(17) आपको किससे मिलना है? अर्थ के आधार पर वाक्य है-
(i) विधानवाचक (ii) प्रश्नवाचक (iii) निषेधवाचक। (iv) आज्ञावाचक

## प्र.(18) वर्णों के सार्थक मेल को कहते हैं-

(i) वर्ण
(ii) शब्द
(iii) पद। (iv) वाक्य।

प्र.(19) व्याकरणिक नियमों में बंधकर शब्द क्या बनता है?
(i) पद
(ii) वर्ण
(iii) वाक्य (iv) शब्द

प्र.(20) ‘अरे! मेरा मित्र प्रथम आया है’ अर्थ के आधार पर वाक्य है-
(i) विधानवाचक (ii) प्रश्नवाचक (iii) निषेधवाचक (iv)विस्मयवाचक

## SUBJECT: SCIENCE

## Students have to do this worksheet on fair notebook.

Q1- Why do the doctors advise to put strips of wet cloth on the forehead of a person having high fever?

Q2- Explain what happens to the molecular motion and energy of 1 kg of water at 273 K when it is changed into ice at same temperature. How is the latent heat of fusion related to the energy exchange that takes place during this change of state?

Q3- The temperature-time graph given alongside shows the heating curve for pure wax.


From the graph answer the following:
(a) What is the physical state of the substance at the points $\mathrm{A}, \mathrm{B}, \mathrm{C}$ and D ?
(b) What is the melting point of the substance?
(c) What is its boiling point?
(d) Which portions of the graph indicates that change of state is taking place?
(e) Name the terms used for heat absorbed during change of states involved in above process.

Q4- You want to wear your favourite shirt to a party, but the problem is that it is still wet after a wash. What steps would you take to dry it faster?

Q5- Kinetic energy of particles of water in three vessels $\mathrm{A}, \mathrm{B}$ and C are EA, EB and EC respectively and $\mathrm{EA}>\mathrm{EB}>\mathrm{EC}$. Arrange the temperatures, TA, TB and TC of water in the three vessels in increasing order.
6.Assertion (A): When an object is in uniform motion, its velocity changes.

Reason (R): In uniform motion, the object covers equal distances in equal intervals of time.
Options:
Both A and R are true, and R is the correct explanation of A .
Both A and R are true, but R is not the correct explanation of A .
A is true, but $R$ is false.

A is false, but $R$ is true.
7.Assertion (A): An object moving with a constant speed cannot have a varying velocity.

Reason (R): Velocity is a vector quantity that depends on both magnitude and direction.
Options:
Both A and R are true, and R is the correct explanation of A .
Both A and R are true, but R is not the correct explanation of A .
A is true, but $R$ is false.
A is false, but $R$ is true.
8.Assertion (A): Displacement can be zero even if the distance travelled is non-zero.

Reason $(\mathrm{R})$ : Displacement is the shortest distance between the initial and final positions of an object.

## Options:

Both A and R are true, and R is the correct explanation of A .
Both A and R are true, but R is not the correct explanation of A .
$A$ is true, but $R$ is false.
A is false, but $R$ is true.
9. The velocity time graph of a body is shown in figure:

a. State the kind of motion represented by OA and OB .
b. What is the velocity of the body at 10 sec and 40 sec .
10.A rocket is launched with an initial velocity of $30 \mathrm{~m} / \mathrm{s}$ and accelerates uniformly at $3 \mathrm{~m} / \mathrm{s}^{2}$. Calculate:
a. The velocity of the rocket after 10 seconds.
b. The height reached by the rocket after 10 seconds.
11.(a) Under which category of mixtures will you classify alloys and why?
(b) A solution is always a liquid. Comment.
(c) Can a solution be heterogeneous?
12. How much water should be mixed with 12 mL of alcohol to obtain $12 \%$ alcohol solution?
13. Classify the following as physical or chemical properties:
(a) The composition of a sample of steel is $98 \%$ iron, $1.5 \%$ carbon and $0.5 \%$ other elements.
(b) Zinc dissolves in hydrochloric acid with the evolution of hydrogen gas.
(c) Metallic sodium is soft enough to be cut with a knife.
(d) Most metal oxides form alkalis on interacting with water.
14. During an experiment the students were asked to prepare a $10 \%$ (Mass/Mass) solution of sugar in water. Ramesh dissolved 10 g of sugar in 100 g of water while Sarika prepared it by dissolving 10 g of sugar in water to make 100 g of the solution.
(a) Are the two solutions of the same concentration?
(b) Compare the mass $\%$ of the two solutions.
15. Rain water stored in a tank contains sand grains, unfilterable clay particles, calcium carbonate, salt, pieces of paper and some air bubbles. Select from amongst the example each of a solvent, a solute, a colloid, and a suspension.
16. Draw a well labelled diagram of chloroplast and mitochondria.
17. Draw a well labelled diagram of plant cell and animal cell.
18. Differentiate between the following:
a) Diffusion and Osmosis
b) Mitosis and Meiosis
c) Smooth Endoplasmic Reticulum and Rough Endoplasmic Reticulum
d) Hypertonic and Hypotonic solution
19. Write short notes on:
a) Membrane biogenesis
b) Golgi apparatus
20. Draw a well labelled diagram of prokaryotic cell showing nucleoid, ribosomes, and plasma membrane.

## Subject: Social Science

## General instructions :-

## Attempting this worksheet is mandatory for all

Students have to do this worksheet on a separate Rs 10 notebook.

## SECTION -A

## Q1 MCQ TYPE QUESTIONS :

(1)Assertion (A): Robespierre's government issued laws placing a maximum ceiling on wages and prices. Meat and bread were rationed.

Reason (R): Peasants were forced to transport their grain to the cities and sell it at prices fixed by the Government.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both A and R are true but R is not the correct explanation of A .
(c) $A$ is correct but $R$ is wrong.
(d) A is wrong but R is correct.
(2)Which of the following influences the duration of the day and night, as one moves from south to north?

A Longitudinal extent
B Latitudinal extent
C Standard Meridian
D All the above
3) Assertion (A) : Democracy is based on consultation and discussion.

Reason (R): A democratic decision always involves many persons, discussions and meetings.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both $A$ and $R$ are true but $R$ is not the correct explanation of $A$.
(c) $A$ is correct but $R$ is wrong.
(d) $A$ is wrong but $R$ is correct.
4) Green Revolution is related to:
(a) Milk Production
(b) Grain production
(c) Fish production
(d) None of the above
5) Assertion (A): Industrialisation brought men, women and children to factories.

Reason (R): Working hours were often long and wages were poor.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both $A$ and $R$ are true but $R$ is not the correct explanation of $A$.
(c) $A$ is correct but $R$ is wrong.
(d) $A$ is wrong but $R$ is correct.
6) Assertion(A): The Sundarbans Delta is formed as a result of the contribution of Ganga and Brahmaputra.

Reason(R): The Sundarbans Delta is triangular in shape. It is an area of land formed by the mouth of the river. It is the world's largest Delta.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both $A$ and $R$ are true but $R$ is not the correct explanation of $A$.
(c) $A$ is correct but $R$ is wrong.
(d) $A$ is wrong but $R$ is correct.
7) Geeta lives in the area of one of the most recent landforms in India. According to geology, it is the most unstable landform in the country. Which physiographic landform is she living in?
A. The Himalayan Mountains
B. The Northern Plains
C. The Islands
D. The Coastal Plains
8) Why can the Chinese government not be called a democratic government even though elections are held there?
(a) Army participates in election
(b) Government is not accountable to the people
(c) Some parts of China are not represented at all
(d) Government is always formed by the Communist Party
9)HYV seeds stands for
(a) Heavy yielding variety seeds
(b) High yielding variety seeds
(c) Half yielding variety seeds
(d) None of the above
10) Assertion (A): In many ways, the French Revolution was a very significant event in the history of the world.

Reason (R): The French Revolution not only inspired French citizens to take action, but it inspired many philosophers and leaders across the globe.
(a) Both A and R are true and R is the correct explanation of A .
(b) Both A and R are true but R is not the correct explanation of A .
(c) A is correct but R is wrong.
(d) A is wrong but R is correct.
11) Assertion (A) : Those who resisted Collectivisation were severely punished. Many were deported and exiled.

Reason (R) : Stalin's government allowed some independent cultivation, but treated such cultivators sympathetically.
(a) Both A and R are true and R is the correct explanation of A .
(b) Both A and R are true but R is not the correct explanation of A .
(c) A is correct but R is wrong.
(d) A is wrong but R is correct.
12) Which of the following parallels of latitude divides India into two almost equal parts?

## A Equator

B Tropic of Capricorn
C Tropic of Cancer
D Prime Meridian
13 ) Assertion (A) : The term drainage describes the river system of an area.
Reason (R) : The area drained by a single river system is called a drainage basin.
(a) Both A and R are true and R is the correct explanation of A .
(b) Both A and R are true but R is not the correct explanation of A .
(c) A is correct but R is wrong.
(d) A is wrong but R is correct.
14) Assertion (A) : Democracy is not just about government of the people but also about government for the people. Reason (R): Democracy ensures that the government is responsive to the needs and aspirations of the people.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both $A$ and $R$ are true but $R$ is not the correct explanation of $A$.
(c) $A$ is correct but $R$ is wrong.
(d) $A$ is wrong but $R$ is correct.
15) Assertion (A) : The labourers in Palampur are paid very high wages.

Reason ( $\mathbf{R}$ ): The competition for labour is very high in the village.
(a) Both $A$ and $R$ are true and $R$ is the correct explanation of $A$.
(b) Both $A$ and $R$ are true but $R$ is not the correct explanation of $A$.
(c) $A$ is correct but $R$ is wrong.
(d) $A$ is wrong but $R$ is correct.
16)Which of the following personalities quoted, "Democracy is of the people, for the people, by the people"?
a) Mahatma Gandhi
b) Albert Einstein
c) Abraham Lincoln
d) Rabindranath Tagore
17) Which of the following is a multiple-cropping practice in Palampur?
a) Growing only wheat
b) Growing wheat and rice together
c) Growing only rice
d) Growing only vegetables
18) $\qquad$ is known as the "Land of Five Rivers" in India.
a) Punjab
b) Haryana
c) Uttar Pradesh
d) Bihar
19) Socialism aimed to establish a society based on:
a) Private ownership of the means of production
b) State ownership of the means of production
c) Individual wealth accumulation
d) Feudal principles
20) Which river forms the famous Jog Falls in Karnataka?
a) Ganga
b) Godavari
c) Krishna
d) Sharavathi

## SECTION-B

## Q2 : SOURCE BASED And PICTURE BASED QUESTIONS :

(A)Read the following source carefully and answer the questions that follows:

On Sunday, 25th February, the government suspended the Duma. Politicians spoke out against the measure. Demonstrators returned in force to the streets of the left bank on the 26th. On the 27th, the Police Headquarters were ransacked. The streets thronged with people raising slogans about bread, wages, better hours and democracy. The government tried to control the situation and called out the cavalry once again. However, the cavalry refused to fire on the demonstrators. An officer was shot at the barracks of a regiment and three other regiments mutinied, voting to join the striking workers. By that evening, soldiers and striking workers had gathered to form a 'soviet' or 'council' in the same building as the Duma met. This was the Petrograd Soviet. The very next day, a delegation went to see the Tsar. Military commanders advised him to abdicate. He followed their advice and abdicated on 2 March. Soviet leaders and Duma leaders formed a Provisional Government to run the country. Russia's future would be decided by a constituent assembly, elected on the basis of universal adult suffrage. Petrograd had led the February Revolution that brought down the monarchy in February 1917.

## Answer the following questions:

(i) What was Duma?
(ii) When did the government suspend the Duma?
(ii) The Police Headquarters were ransacked on $\qquad$ .
(iii) The Tsar was advised by $\qquad$ to abdicate throne .
(iv) Petrograd had led $\qquad$ Revolution.
(B) Syria is a small West Asian country. The ruling Ba'ath Party and some of its small allies are the only parties allowed in that country.

(i) Do you think this cartoon could apply to China or Mexico?
(ii) Which principle of democracy is violated here ?
(C ) Identify the image given below :


Valley
Gorge

Ox Bow lake
Estuary
(D) Look at the picture and answer the following questions.

(i) Name the event.
(ii) State two causes that led to the event.
(iii) State two significance of the event in the history of France.
(E) Look at the picture and answer the following questions

(i) What does the graph show?
(ii) In which year the area under cultivation was less?
(iii) Why is it necessary to increase the area under cultivation?
(F) Identify and name the islands shown in the picture given below

(G) Identify the Revolution in Russia with the help of clues given :
(i) In this Revolution, 100 people were killed in front of the Winter Palace on Sunday
(ii) In this Revolution, the Military Revolutionary Committee was formed and the PM of the Provisional government had left Petrograd to arrange troops $\qquad$ .
(iii) In this Revolution, International Women's Day was celebrated on 23Feb, 1917
$\qquad$ .

## SEGTION -E

Q3 On a Political map of India, identify and mark the following Note: Use single map for each question (Total 4 maps )

Q1 Locate and mark these :
Neighbors of India
Standard Meridian of India
Tropic of Cancer
Q2 Locate and mark these (Use 2 maps)

## Map 1:-

Himalayan ranges
Deccan Plateau
Western ghats \& Eastern ghats
Western coastal plain - Konkan, Kannad \& Malabar coast
Eastern Coastal plain - Northern Circars \& Coromandel coast

## Map 2 :-

Mountain peaks - K2, Kanchenjunga, Mount Kailash, Mt. Everest, Namcha Barwa .
Hills - Garo hills, Khasi hills, Mizo hills .
Q3 Locate and mark these :
Himalayan rivers along with tributaries
Peninsular rivers
Chilika lake, Wular lake, Pulicat lake .

## SECTION-D

## Answer the following Questions :

What is the contribution of the French Revolution and Russian Revolution in the World? What is the difference between Eastern ghats and Western ghats ? Write five points of difference between Himalayan rivers and Peninsular rivers .

Why is Democracy considered as the Best Form of Government?
How did the Green Revolution change the lives of the Indian farmers?

## SUBJECT - ENGLISH

## Q 1. Read the passage given below and answer the questions/complete the sentences that

 follow:Sniffer dog Tucker uses his nose to help researchers find out why a killer whale population off the northwest coast of the United States is on the decline. He searches for whale faeces floating on the surface of the water, which are then collected for examination. He is one of the elite team of detection dogs used by scientists studying a number of species including right whales and killer whales.

Conservation canines are fast becoming indispensable tools for biologists according to Aimee Hurt, associate director and co-founder of Working Dogs for Conservation, based in Three Forks, Montana.

Over the last few years, though, so many new conservation dog projects have sprung up that Hurt can no longer keep track of them all. Her organization's dogs and their handlers are fully booked to assist field researchers into 2012.
"Dogs have such a phenomenal sense of smell", explained Sam Wasser, director of the Center for Conservation biology at the University of Washington in Seattle. He has worked with scat-detection dogs since 199(g). Scientists have been using Conservation Canines in their research since 199(g).

These dogs have enabled them to non-invasively access vast amount of genetic and physiological information which is used to tackle conservation problems around the world. Such information has proved vital for determining the causes and consequences of human disturbances on wildlife as well as the actions needed to mitigate such impacts.

The ideal detection dog is extremely energetic with an excessive play drive. These dogs will happily work all • day long, motivated by the expectation of a ball game as a reward for sample detection. The obsessive, high energy personalities of detection dogs also make them difficult to maintain as pets.

As a result, they frequently find themselves abandoned to animal shelters, facing euthanasia. The programme rescues these dogs and offers them a satisfying career in conservation research.
(a) According to the text there are a few $\qquad$ detection dogs like Tucker.
(b) Tucker sniffs for whale $\qquad$
(c) The dogs are special because they assist in research without $\qquad$
(d) The ideal detection dog $\qquad$
(e) The dogs expect $\qquad$ as a reward of their hard work.
(f) $\qquad$ of these dogs make it difficult to keep them as pets.
(g) These dogs find career in $\qquad$
(h) The word 'euthanasia' means $\qquad$

## Q. 2 Complete the following sentences using the correct form of the verb given in brackets.

1. The thief $\qquad$ (catch) red-handed.
2. A bomb scare $\qquad$ (delay) the flight by almost two hours.
3. The stadium $\qquad$ (reverberate) with dance, music and drama as troupes from different parts of the country $\qquad$ (present) a panorama of color and costume.
4. 1 $\qquad$ (spend) the whole day yesterday in bed.
5. Students from different parts of the country $\qquad$ (participate) in the program.
6. It is true that Jim-Corbett $\qquad$ (love) animals but he also $\qquad$ (kill) many man-eaters.
7. 1 $\qquad$ (learn) Telugu from a friend who $\qquad$ (hail) from Andhra Pradesh.
8. The bridge across the river $\qquad$ (build) some two hundred years ago.
9. The wicked people who $\qquad$ (smuggle) brown sugar into the town $\qquad$ (arrest) yesterday.
10. Last night, the clouds $\qquad$ (thunder) in the sky.

## Q. 3 Choose the correct verb form that agrees with the subject in each of the following sentences:

1. Neither of the boys $\qquad$ (has/have) done their homework.
2. The group of students $\qquad$ (is/are) going on a field trip today.
3. Either the cake or the cookies $\qquad$ (taste/tastes) delicious.
4. My dog, as well as my cats, $\qquad$ (is/are) sleeping in the sun.
5. Ten dollars $\qquad$ (is/are) too much to pay for a cup of coffee.
Q. 4 You are going on a school picnic with your classmates and teachers. You are very excited. The night before the trip you sit down to write your diary. Describe what you have planned for the picnic and how you hope to enjoy yourself there. You are Rajesh. Write your diary in 100-150 words.
Q. 5 Read any one book of the following books and share your reviews in the class after vacations:

Any book by Ruskin Bond
Wings of Fire by APJ Abdul Kalam
Any book by Sudha Murthy
NOTE : Holiday Homework is to be done in a separate notebook.

## SUBJECT - ARTIFICIAL INTELLIGENCE

Summer Break Assignments [AI]

Class - IX(2024-25)

Assignments on Updated AI curriculum from CBSE support book

- Read 2.1: Basics of Data Literacy from AI Curriculum Class-9 Facilitator Handbook.
- Complete associated assignments/QA.
- Pdf of the handbook will be posted in class groups.


## Employability Skills

- Use the concept of $S \quad I L E$ and Self Confidence to manage any 5 situations during the summer break and take a note of your experience on 5 colour sheets/pages.
- Attach in your AI notebook.


Write a review after watching the IBM AI Ethics project video

- What is AI Ethics? - YouTube




## Have constructive time and contributive

