



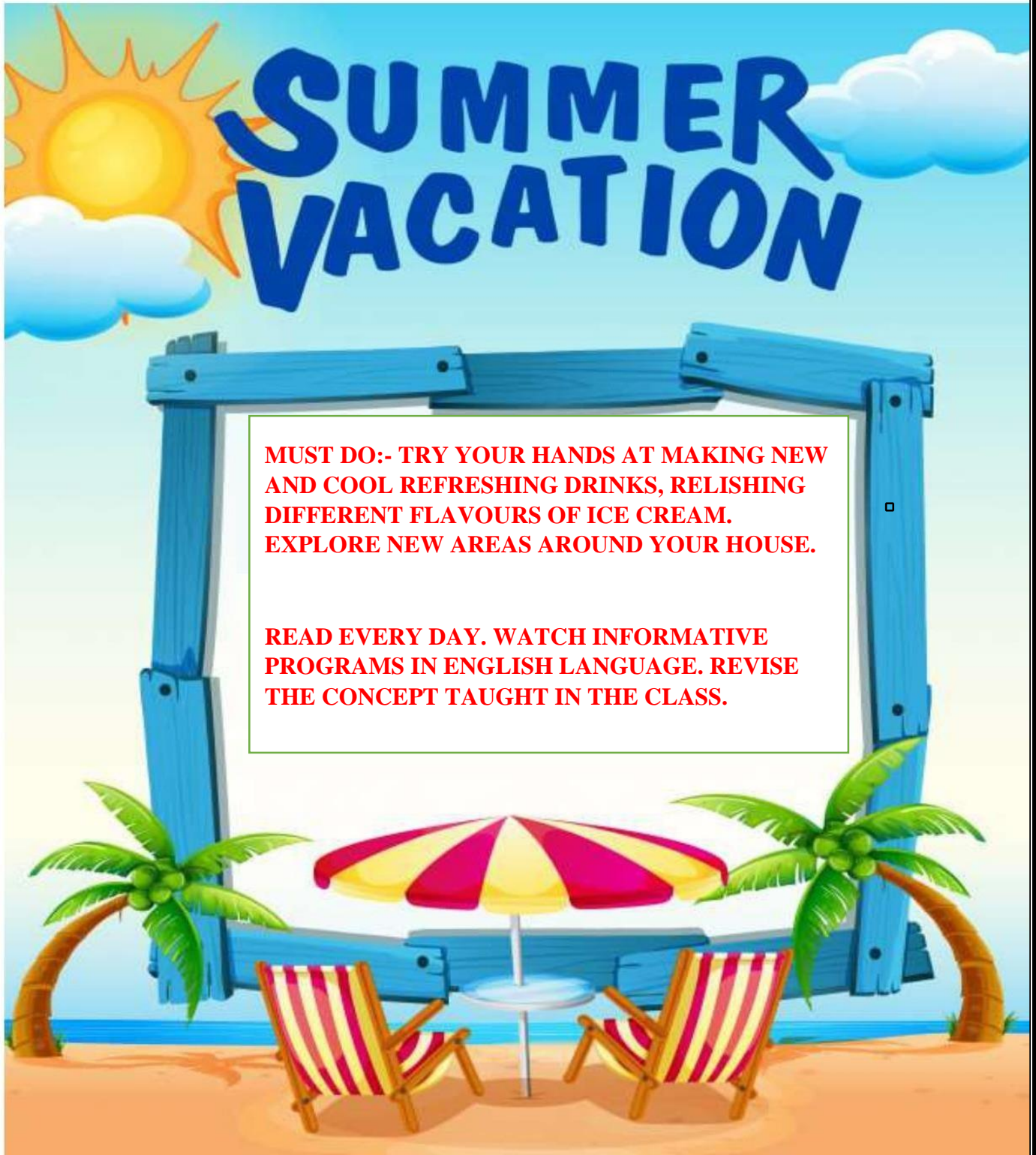
Mount Columbus School

C-Block, Dakshinpuri, New Delhi - 110062

SESSION :- 2024-2025

HOLIDAY HOMEWORK

CLASS : X



SUMMER VACATION

MUST DO:- TRY YOUR HANDS AT MAKING NEW AND COOL REFRESHING DRINKS, RELISHING DIFFERENT FLAVOURS OF ICE CREAM. EXPLORE NEW AREAS AROUND YOUR HOUSE.

READ EVERY DAY. WATCH INFORMATIVE PROGRAMS IN ENGLISH LANGUAGE. REVISE THE CONCEPT TAUGHT IN THE CLASS.

PREFACE

Dear Parents and Students,

Summer vacation is around the corner, bringing with itself a much-needed respite from hectic school days. We hope that you will thoroughly enjoy the vacations and make the most of this summer. While it is indeed important that you relax and refresh yourselves, it is also important that you exercise your minds.

Keeping this in mind, we have designed various exciting activities to keep the students engaged and active during the summer vacation. These fun projects/ assignments would enhance learning skills, help understand concepts better, and make for a great crash course aimed at improving academic output.

These activities will not only help you to revise what was taught, but will also enrich your knowledge. These projects will be assessed as Subject Enrichment Activity, Portfolio or Art Integrated Activity.

We encourage parents to motivate and support the students to ensure the given work is completed in time, to the best of their ability. Your support and encouragement both have a huge impact on your child's learning ability.

The Holiday Home Work is to be done neatly with relevance to the questions asked and to be submitted to the subject teachers within a week of reopening of the school i.e. 1st July to 6th July' 24. **It is important that deadlines are met.**

Wishing you a fun filled, safe summer vacation.

ENGLISH

PROJECT WORK

You have read two of the poems of Robert Frost.

Make a detailed project on this American poet highlighting the following topics –

- a. Biography b. Work c. Awards and recognition d. Legacy and Cultural Influence

Following questions to be done in Notebook (a thin notebook to be made)

WRITING SKILLS

1. You are Sunidhi Prakash, the Vice Captain of Brilliant Vidyalaya, Barra, Kanpur. You have recently noticed several posters around your school premises conveying a hazardous message:

Lose weight in just a month!

“A WONDER DIET comes to your rescue ...

A privilege available for only a few!”

Write a letter to the Editor of The DWA, in not more than 120 words, drawing attention towards harm caused by such advertising. Propose the implementation of “Wholesome Lunch Month’ in schools as an idea to address such practices, mention the advantages and share suggestions to foster healthy eating routines and develop positive body image among youngsters.

2. You are Zac Skaria, a resident of # 412, Magna Greens Apartments, Gandhi Marg, Jonpara, Mumbai. Three students of grade 10 from your residential complex have rescued and rehabilitated a few old beggars from the neighbourhood. You think that their work deserves appreciation and recognition. Write a letter to the President of the RWA, seeking recommendation for these youth, to be nominated for ‘Serving Citizens’ Award’. Suggest other ways such acts of kindness could be recognised and awarded in the future.

LITERATURE

Answer the following questions.

3. Validate the given statement with reference to baby seagull’s fear. ‘Fear doesn’t exist anywhere else other than one’s mind.’
4. Explain why the poet personally holds the conviction that the world will primarily end in fire?
5. Dr. Herriot knew his patients as well as their owners really well. Discuss.
6. State one likely reason the writer of The Midnight Visitor chose to characterize Ausable as short and fat.
7. Fiction writers prefer creating grey characters rather than black and white. Analyse this in detail, with reference to both the characters of The Thief’s Story.
8. What was the name of Anne’s Math teacher?
9. Do you think Mr. Keesing was a strict teacher?
10. What role does the diary play in Anne’s life?

GRAMMAR

Fill in the blanks with appropriate verb-

11. All my friends _____ here. (be)
12. I _____ the guitar. (play)
13. They _____ packed all that they will need for the trip. (have)
14. Samantha, Rachel and Sheena _____ eighth-grade students. (be)
15. Sam _____ Dutch. (speak)

16. It _____ good that you _____ people around here. (be, know)
17. Doctors _____ a problem and _____ a cure. (recognise, suggest)
18. The news of the accident _____ very disturbing. (be)
19. Manu _____ to school every day. (walk)
20. Brittany _____ beautifully. (dance)

हिंदी

परियोजना कार्य

(i) आपकी पुस्तक स्पर्श का पाठ-10 ततार्रा-वामीरो एक प्रेम कथा है, जो समाज की रुढ़िवादी सोच के घातक परिणाम को दर्शाता है साथ ही प्रेमियों की मृत्यु के बाद बदलाव को भी। भारत में कई ऐसे मामले समाचार में आए दिन देखने, पढ़ने, सुनने को मिलते हैं जब प्रेमी जोड़ों को जातिगत, धर्मगत आदि के चलते कई बुरे परिणाम झेलने पड़ते हैं। इसी बात को ध्यान में रखते हुए निम्न को हल कर लिखिए-

- (i) पिछले 20 दशकों में गुजरात, हरियाणा, राजस्थान में प्रेमी जोड़ों के साथ हुए दुर्व्यवहार के चलते बुरे परिणाम का एक ब्यौरा तीनों राज्यों के मध्य अंतर प्रदर्शित करते हुए ग्राफ पर दर्शाइए। (गणित विषय से एकीकृत)
- (ii) प्रेम से आपका अपना क्या तात्पर्य है-पर लगभग 100 शब्दों में विचार अभिव्यक्त कर लिखिए।
- (iii) 'ततार्रा-वामीरो' प्रेम कथा को कॉमिक स्ट्राइप की सहायता से प्रदर्शित कर लिखिए। (दृश्य कला)

(उपरोक्त कार्य को स्क्रेप बुक में करें)

व्याकरण

1. निम्नलिखित वाक्यों के रेखांकित भाग में प्रयुक्त पदबंध के भेद लिखें-
 - (i) सामने की दीवार पर बना हुआ चित्र बहुत आकर्षक है।
 - (ii) बहुत परिश्रम करने वाला वह फेल नहीं हो सकता।
 - (iii) वह पिछले तीन घंटे से लगातार लिख रहा है।
 - (iv) नीले कुर्ते वाला लड़का बहुत बुद्धिमान है।
2. निम्नलिखित समस्त पदों का विग्रह कीजिए और समास का नाम भी लिखिए –
कर्मभूमि, क्रोधाग्नि, कार्यकुशल, कालीमिर्च, कमलनयन, बाढ़ग्रस्त, अकालपीड़ित, कृपापात्र, सेनानायक
3. निम्नलिखित मुहावरों को अपने वाक्यों में इस तरह प्रयोग कीजिए कि उनका अर्थ स्पष्ट हो जाए –
आँखें चुराना, आसमान में उड़ना, आग-बबूला होना, हाथ फैलाना, सुध-बुध खोना, श्रीगणेश करना, इधर-उधर की हाँकना, कलेजा ठंडा होना, तितर-बितर होना, दो नावों पर पैर रखना

स्पर्श-भाग-2

4. कबीर की भाषागत विशेषताएँ संक्षेप में लिखें।
5. मीराबाई ने श्रीकृष्ण के रूप सौंदर्य का वर्णन किस प्रकार किया है? अपने शब्दों में लिखिए
6. कबीरदास जी ने बिरह रूपी सर्प के विषय में क्या कहा है ?
7. मीराबाई श्री कृष्ण की चाकरी क्यों करना चाहती है?
8. बड़े भाई साहब को अपने मन की इच्छाएँ क्यों दबानी पड़ती थी ?
9. व्यक्ति को किस प्रकार का जीवन व्यतीत करना चाहिए? 'मनुष्यता' कविता के आधार पर लिखें।
10. महापुरुषों जैसे कर्ण, दधीचि, सीबी ने मनुष्यता को क्या सन्देश दिया है इस कविता में?
11. 'डायरी का पत्रा' पाठ आपको देश की आजादी के इतिहास को पढ़ने के लिए किस प्रकार प्रोत्साहित करता है
12. लेखक की डायरी का एक पत्रा' भावी पीढ़ी को किस प्रकार प्रेरित करता है ? स्पष्ट कीजिए।

संचयन

13. हरिहर काका के मामले में गाँव वालों की क्या राय थी और उसके क्या कारण थे?
14. यदि आपके आसपास हरिहर काका जैसी हालत में कोई हो तो आप उसकी मदद कैसे करेंगे?

15. वर्तमान समय में हरिहर काका जैसे लोगों को देखते हुए युवा पीढ़ी का क्या कर्तव्य होना चाहिए?

लेखन

16. आपको अपना मकान किराए पर देना है, इसके लिए एक आकर्षक विज्ञापन तैयार करें -

17. बहुत कम कीमत के स्मार्ट फोन बनाने वाली कंपनी के लिए एक सुंदर विज्ञापन तैयार करें।

18. अपने क्षेत्र में पेयजल की समस्या से अवगत कराते हुए जल विभाग के अधिकारी को पत्र लिखें।

19. विद्यालय में आयोजित होने वाली 'वार्षिक खेल प्रतियोगिता' में भाग लेने के लिए निवेदन करते हुए, खेल शिक्षक को पत्र लिखें।

20. निम्नलिखित विषय पर 100 से 120 शब्दों में अनुच्छेद लिखें -

मोबाइल फोन : सुखद व दुखद भी

* विज्ञान की अद्भुत खोज: संचार के क्षेत्र में क्रांति, सस्ता और सुलभ साधन, लाभ और हानियाँ
(उपरोक्त कार्य को उत्तरपुस्तिका में करें)

MATHEMATICS

PROJECT WORK

Using cardboard/thermocool : 1. Make a family of Real Numbers.

2. Show any one way to represent probability.

Solve the following questions from R.S Aggarwal on A4 size sheets:

Ch -1 Real Numbers

Ex 1B Q4, Q7, Q8, Q11, Q33

Ex 1C Q3

Ex 1D Q4, Q8, Q9

Ch -2 Polynomials

Ex 2A Q1 to Q12

Ch -6 Coordinate Geometry

Ex 6A Q1, Q4, Q7, Q9, Q25

Ex 6B Q2, Q5, Q9, Q14, Q15, Q27

Ch -19 Probability

Ex 19 Q3, Q10, Q12, Q16, Q22, Q32, Q37, Q43

Solve the following questions on A4 size sheets:

Q1. 2.373737... is

(a) an integer (b) a rational number (c) a natural number (d) an irrational number

Q2. The HCF of a number which is neither prime nor composite and any other number x is:

(a) x (b) $x + 1$ (c) 1 (d) Any number

Q3. Select the incorrect answer,

$(2 + \sqrt{5})(2 - \sqrt{5})$ is:

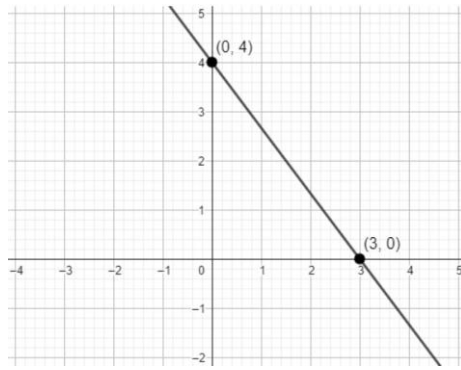
(a) a natural number (b) a rational number (c) a whole number (d) an irrational number

Q4. Write an irrational number between 2 and 3.

(a) 2.5 (b) 2.001 (c) 2.1333333456... (d) 2.13

Q5. The given linear polynomial $y = f(x)$ has

- (a) 2 zeros (b) 1 zero and the zero is '3'
(c) 1 zero and the zero is '4' (d) No zero



Q6. The LCM of smallest two-digit composite number and the smallest composite number is:

- a) 12 b) 4 c) 20 d) 44

Q7. The distance of the point(3,5) from x-axis(in units) is:

- a) 3 b) - 3 c) 5 d) -5

Q8. The point which divides the line segment joining the points (7, -6) and (3, 4) in ratio 1 : 2 internally lies in the

- a) III quadrant b) II quadrant c) I quadrant d) IV quadrant

Q9. The exponent of 2 in the prime factorisation of 144, is

- a) 4 b) 5 c) 6 d) 3

Q10. Assertion (A): Distance of (5, 12) from the y-axis is 5 units.

Reason (R): The distance of the point (h, k) from the y-axis is always k units.

- 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 true but R is false.
d) A is false but R is true.

Q11. Assertion (A): The H.C.F. of two numbers is 16 and their product is 3072. Then their L.C.M. = 162

Reason: If a, b are two positive integers, then H.C.F. L.C.M. = a b

- 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 true but R is false.
d) A is false but R is true.

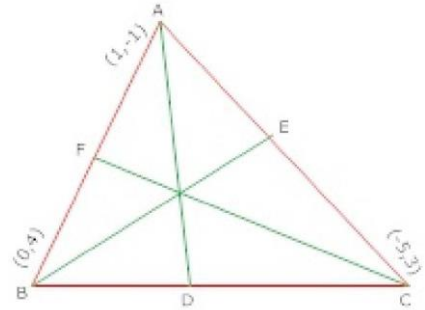
Q12. National Art convention got registrations from students from all parts of the country, of which 60 are interested in music, 84 are interested in dance and 108 students are interested in handicrafts. For optimum cultural exchange, organisers wish to keep them in minimum number of groups such that each group consists of students interested in the same art form and the number of students in each group is the same. Find the number of students in each

group. Find the number of groups in each art form. How many rooms are required if each group will be allotted a room?

Q13. Write the family of quadratic polynomials having $-1/4$ and 1 as its zeros.

Q14. The two opposite vertices of a square are $(1, -6)$ and $(5, 4)$. Find the coordinates of the other two vertices.

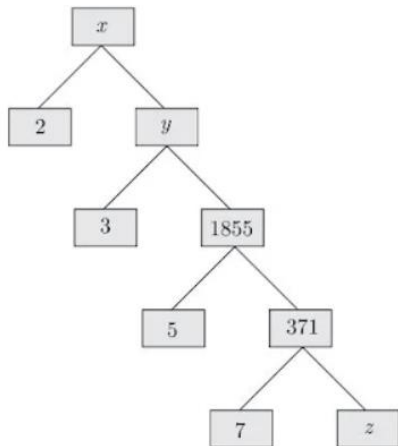
Q15. Find the lengths of the medians of the triangle whose vertices are $(1, -1)$, $(0, 4)$ and $(-5, 3)$.



Q16. If α, β are zeroes of quadratic polynomial $5x^2 + 5x + 1$, find the value of

i) $\alpha^2 + \beta^2$ ii) $\alpha^3 + \beta^3$ iii) $\alpha^{-1} + \beta^{-1}$ iv) $\alpha - \beta$ v) $\alpha^3 - \beta^3$

Q17. i) Complete the following factor tree and find the composite number x.

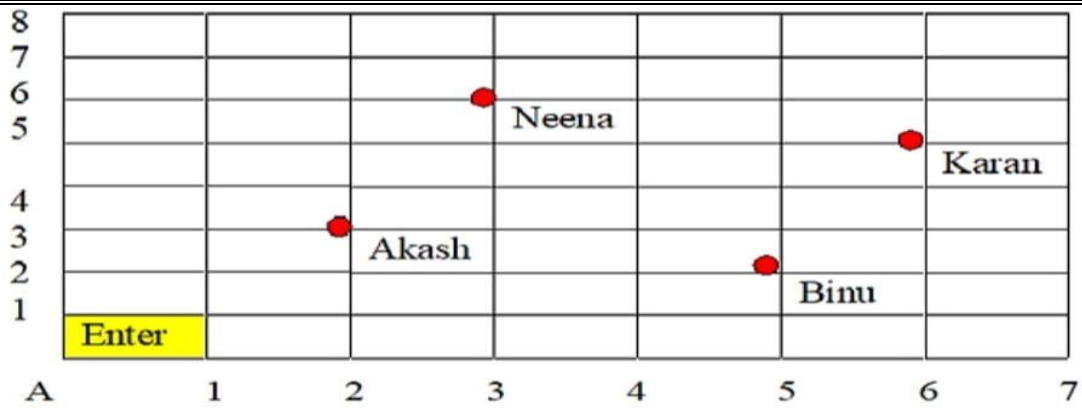


ii) Check whether 4^n can end with the digit 0 for any natural number n.

iii) Can two numbers have 15 as their HCF and 175 as their LCM? Give reasons.

Q18. Read the text carefully and answer the questions:

Karan went to the Lab near to his home for COVID 19 test along with his family members. The seats in the waiting area were as per the norms of distancing during this pandemic (as shown in the figure). His family member took their seats surrounded by red circular area.



(i) What is the distance between Neena and Karan?

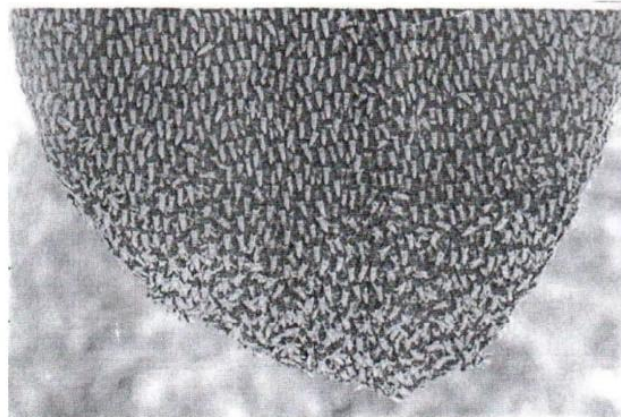
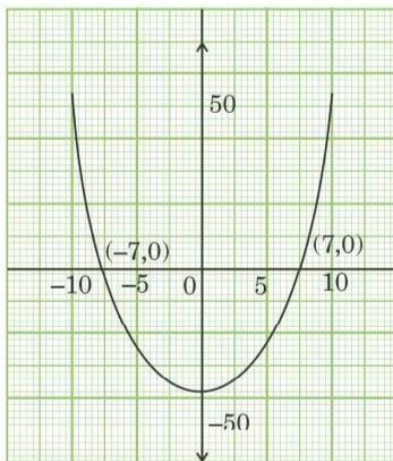
(ii) What are the coordinates of seat of Akash?

OR

Find distance between Binu and Karan.

(iii) What will be the coordinates of a point exactly between Akash and Binu where a person can be?

Q19. While playing in a garden, Samaira saw a honeycomb and asked her mother what is that. Her mother replied that it's a honeycomb made by honeybees to store honey. Also, she told her that the shape of the honeycomb formed is a mathematical structure. The mathematical representation of the honeycomb is shown in the graph.



Based on the above information, answer the following questions :

(i) How many zeroes are there for the polynomial represented by the graph given ?

(ii) Write the zeroes of the polynomial.

(iii) If the zeroes of a polynomial $x^2 + (a + 1)x + b$ are 2 and 3, then determine the values of a and b.

OR

(iii) If the square of difference of the zeroes of the polynomial $x^2 + px + 45$ is 144, then find the value of p.

Q20. Read the text carefully and answer the questions:

Using Cartesian Coordinates we mark a point on a graph by how far along and how far up it is.

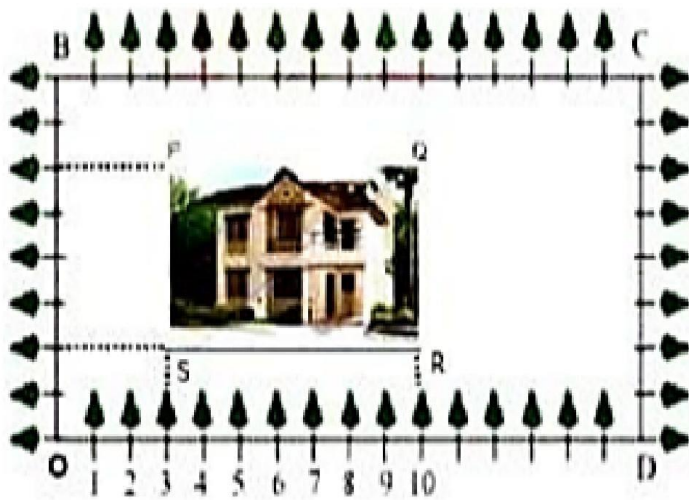
The left-right (horizontal) direction is commonly called X-axis.

The up-down (vertical) direction is commonly called Y-axis.

In Green Park, New Delhi Suresh is having a rectangular plot ABCD as shown in the following figure. Sapling

of Gulmohar is planted on the boundary at a distance of 1 m from each other. In the plot, Suresh builds his house

in the rectangular area PQRS. In the remaining part of plot, Suresh wants to plant grass.



(i) Find the coordinates of the midpoints of the diagonal QS.

(ii) Find the length and breadth of rectangle PQRS.

(iii) Find Area of rectangle PQRS.

OR

Find the diagonal of rectangle.

SCIENCE

PORTFOLIO WORK

Prepare a brief write-up on the chapter OUR ENVIRONMENT and compile it in a file.

Instructions:

- File should have at least content of 12 pages.
- Add pictures (paste/ draw) related to the content.
- File should have the Index, acknowledgment and bibliography.

PRACTICALS: Do the following science experiments in the science Practical file.

- Determination of the focal length of the Concave mirror by obtaining the image of a distant object.
- Determination of the focal length of the Convex lens by obtaining the image of a distant object.
- Finding the image distance for varying object distance in case of Convex lens and drawing corresponding ray diagrams to show the nature of image formation.
- To perform and observe the following reactions: combination, decomposition, displacement and double displacement reaction.
- Find the pH of the samples by using pH paper.
- To study the properties of acids and bases.
- To prepare temporary mount of a leaf peel to show stomata.
- To show that carbon-dioxide is given out during respiration.

WORKSHEET

Complete the given worksheet in Physics notebook.

Instructions

1. Questions no. 1 to 5 are objective-type questions.
2. Question no. 6 to 10 are very short questions. Answers to these questions should be in the range of 30 to 50 words.
3. Question no. 11 to 14 are short answer type questions. The answer to this question should be in the range of 50 to 80 words.
4. Question no. 15 to 17 are long answer-type questions. The answer to this question should be in the range of 80 to 120 words.
5. Question no. 18 to 20 are source-based/case-based questions. Answers to these questions should be in the range of 50 to 80 words.

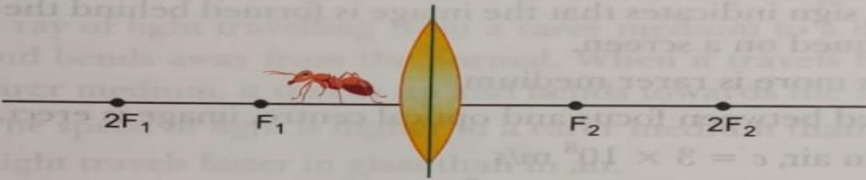
1. A sportsman, after a long break of his routine exercise, suffered muscular cramps during a heavy exercise session. This happened due to:
- a) lack of carbon dioxide and formation of pyruvate.
 - b) presence of oxygen and formation of ethanol.
 - c) lack of oxygen and formation of lactic acid.
 - d) lack of oxygen and formation of carbon dioxide.

2. An object is placed in front of a convex mirror. Its image is formed:
- a) at a distance equal to the object distance in front of the mirror.
 - b) at twice the distance of the object in front of the mirror.
 - c) half the distance of the object in front of the mirror.
 - d) behind the mirror and it's position varies according to the object distance.



3. Oxidation is a process which involves
- (a) addition of oxygen
 - (b) addition of hydrogen
 - (c) removal of oxygen
 - (d) removal of hydrogen



4.

An ant was in front of a convex lens as shown below.



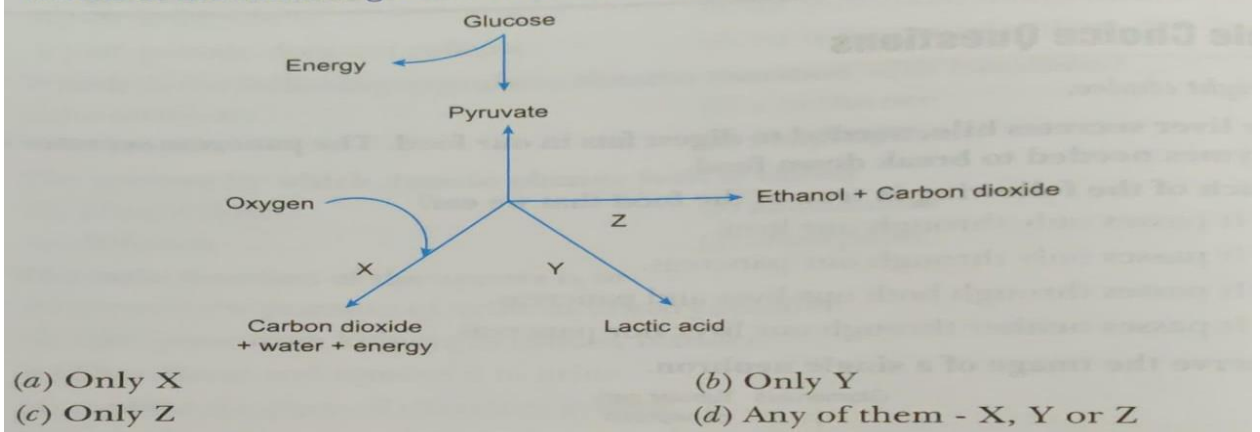
Which of the following image is correct?

(a)  (b) 

(c)  (d) 

5.

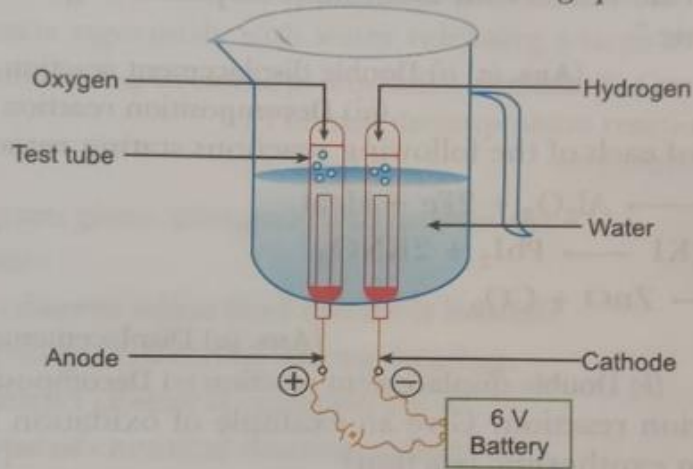
Which of the following occurs during oxygen shortage in muscle cells?



- What are the different ways in which glucose is oxidised to provide energy in various organisms?
- Why do veins have thin walls as compared to arteries?
- Name the type of mirror(s) that should be used to obtain:
 - a magnified and virtual image.
 - a diminished and virtual image of an object.
- A shining metal 'M', on burning gives a dazzling white flame and changes to a white powder 'N'. Identify 'M' and 'N'. Also write the chemical reaction of the same.
- In the reaction, $\text{MnO}_2 + 4\text{HCl} \rightarrow \text{MnCl}_2 + 2\text{H}_2\text{O} + \text{Cl}_2$
 - Name the substance oxidised.
 - Name the substance reduced.
- Find the focal length of a lens of power -2.0 D. What type of lens is this?
 - The speed of light in air is 3×10^8 m/s, whereas that of the speed of light in water is 2.26×10^8 m/s. What is the refractive index of water with respect to air?
- An object is placed between infinity and the pole of a convex mirror. Draw a ray diagram and also state the position, the relative size and the nature of the image formed.
- Why is blood circulation in human heart called double circulation?
 - If the leaves of a plant first prepare food A by photosynthesis, then food A gets converted into food B. What are A and B?
- Write balanced chemical equation for the following:
 - Dilute hydrochloric acid is added to iron filings.
 - Hydrogen gas combines with nitrogen to form ammonia.

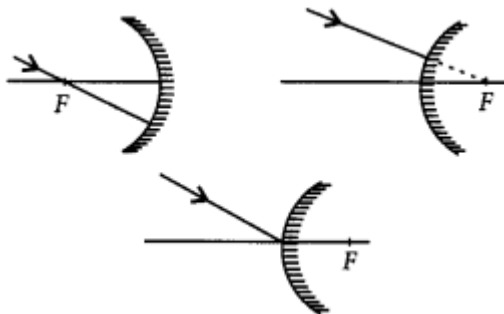
15.

Study the figure given below and answer the following questions:



- Name the process depicted in the diagram.
- Write the composition of the anode and the cathode.
- Write the balanced chemical equation of the reaction taking place in this case.
- The reaction does not take place if a few drops of dilute sulphuric acid are not added to water. Why?

16. a. Draw the following diagram in which a ray of light is incident on a concave/convex mirror, on your answer sheet. Show the path of this ray, after reflection, in each case.

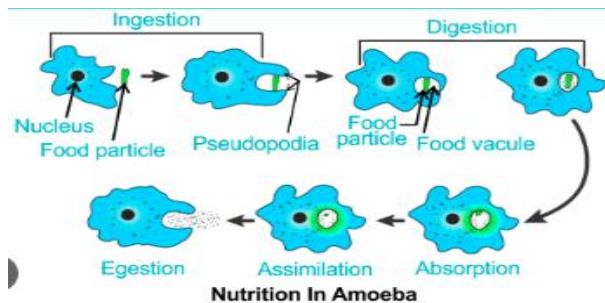


b. Write one use of concave mirror and convex mirror.

- Draw a well labelled diagram to show excretory system of humans.
- Name any two substances that are selectively reabsorbed from the tubules of the nephron.
- Which part of the excretory system temporarily stores the urine?

18. Observe the diagram showing nutrition in amoeba and answer the questions that follow:

- What is this process of obtaining food called?
- How does amoeba ingest food? Explain.
- What is the food vacuole considered as?



Reflecting surface do not have to be flat. The most common curved mirrors are spherical. A spherical mirror is called convex if the reflection takes place on the outer surface. A mirror is called concave if the reflecting surface is on the inner surface of the sphere. We first consider an object that is very far from a concave mirror. For an object infinitely far away the ray would be precisely parallel.

The law of reflection holds for each of these rays at the point each strikes the mirror. As can be seen, they are not all brought to a single point. In order to form a sharp image, the rays must come to a point.

The point F , where rays parallel to the principal axis come to a focus is called focal point of the mirror and focal length of the mirror is half of radius of curvature (R).

i.e.,
$$f = \frac{R}{2}$$

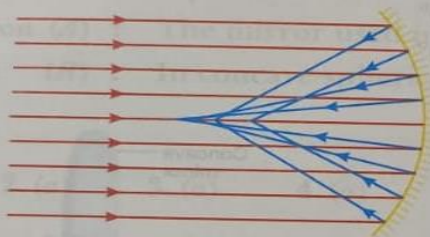


Fig. 1: Parallel rays striking a concave spherical mirror do not focus at precisely a single point

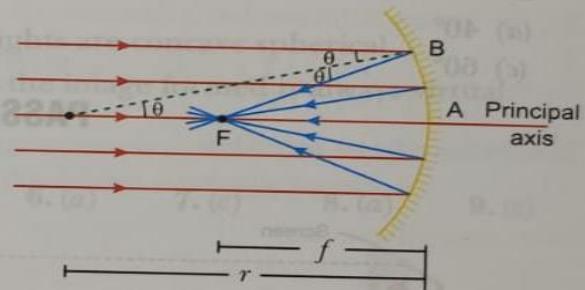


Fig. 2: Rays parallel to the principal axis of a spherical mirror come to a focus at F , called the focal point, as long as the mirror is small in width as compared to its radius of curvature, R , so that the rays are "parallel"—that is, make only small angles with the axis.

(i) The laws of reflection is true for

- (a) the convex mirror only (b) the concave mirror only
(c) all reflecting surfaces (d) the convex lens only

ii) The amount of light reflected depends on

- (a) the smoothness of the reflecting surface (b) the nature of the reflecting surface
(c) the nature of material of the object (d) all of these

iii) The angle between an incident ray and plane mirror is 40° . The total angle between the incident ray and reflected ray will be

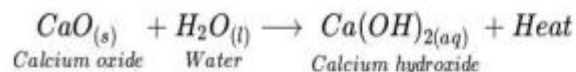
- (a) 35° (b) 70°
(c) 40° (d) 80°

(iv) An object 20 cm from a spherical mirror gives rise to virtual image 15 cm behind the mirror. The type of mirror and its focal length is

- (a) concave; 30 cm (b) concave; 60 cm
(c) convex; 30 cm (d) convex; 60 cm

20.

A reaction in which two or more reactants combine to form a single product is called a combination reaction. For example, calcium oxide reacts vigorously with water to form calcium hydroxide. The reaction is highly exothermic in nature, as lots of heat is produced during the reaction.



Solution of $\text{Ca}(\text{OH})_2$ is used for white wash the walls. Calcium hydroxide reacts slowly with carbon dioxide in air to form a thin layer of calcium carbonate on the wall which gives a shiny appearance to wall. Calcium carbonate will form after two or three days of white wash.

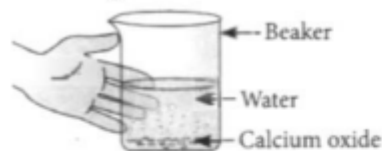
What is the chemical name of quick lime? [1]

- a) Calcium carbonate b) Calcium oxide
c) Carbon dioxide d) Calcium hydroxide

When carbon dioxide is passed through lime water, [1]

- a) calcium hydroxide is formed b) white precipitate of CaO is formed
c) colour of lime water becomes green. d) lime water turns milky

Following observations are observed when calcium oxide reacts vigorously with water.



Identify the incorrect observations.

- I. It is an endothermic reaction.
II. Slaked lime is produced.
III. Quick lime is produced.
IV. It is an exothermic reaction.
V. It is a combination reaction.

- a) (III) and (IV) b) (I) and (II)
c) (II), (IV) and (V) d) (I) and (III)

Quick lime combines vigorously with water to form (A) which reacts slowly with the carbon dioxide in air to form (B). Identify the compounds(A) and (B).

- a) (A) - Calcium, (B) - Calcium bicarbonate b) (A) - Calcium carbonate, (B) - Calcium hydroxide
c) (A) - Calcium bicarbonate, (B) - Calcium d) (A) - Calcium hydroxide, (B) - Calcium carbonate

SOCIAL SCIENCE

PROJECT

Prepare a project on the following topics according to the distribution of sections.

S. NO.	TOPIC	SECTIONS
1	Consumer Awareness	10 A
2	Sustainable Development	10 B
3	Social Issues	10 C &D

The project report will be presented in the following order:

1. Cover page showing name of the school, session, project title and student information.
2. List of content with page numbers (Introduction, Objective, Policies, Act, Case study, Conclusion)
3. Acknowledgement
4. Project overview: Purpose, Aim & Methodology.
5. Conclusion
6. Bibliography

The total length of the project report should be no more than 10-15 pages of A4 size sheet. Collect relevant information, facts, pictures and figures to prepare the project. All the photographs and sketches should be labelled. It should be handwritten/printed and credit will be awarded to use of maps, graphs, articles of newspapers and magazines, good layout, cost effective and creative use of materials.

ASSIGNMENT

1. Do the work in Lab Manual Social Science.

- Complete the worksheet–
1. Rise of Nationalism in India
 2. Forest and Wildlife Resources

2. Answer the following questions.

1. What is power sharing?
2. What is Agenda 21?
3. What is resource planning?
4. Define average income.
5. Who founded the secret society, 'Young Italy' during the 1830s?
6. Who remarked "When France sneezes, the rest of Europe catches cold"?
7. Name the country which follows 'coming together' and 'holding together' federalism.
8. Which subjects are included in the Union List, State List and Concurrent List?
9. Why power sharing is important in a democracy?
10. What was the main aim of the French Revolutionaries?
11. Why is horizontal distribution of power Often referred to as a system of "checks and balances"?
12. Which factor is responsible for increasing the feeling of alienation among the Sri Lankan Tamils?
13. How can power be shared among governments at different levels?
14. Why is it essential to have resource planning?

15. What are the main types of soil found in India? Which type of soil is the most widespread and important soil of India?
16. 'Land is a natural resource of utmost importance'. Justify the statement.
17. Explain the reforms introduced by Napoleon in the territories he conquered.
18. Give any two common developmental goals of the people. State any two goals of development other than income.
19. Mention any one limitation of per capita income as an indicator of development.
20. "People have conflicting development goals". Support the statement with examples.

(N.B-Do the assignment work in Social Science workbook.)

ARTIFICIAL INTELLIGENCE

1. The linguistic issue is also known as _____ issues.
 - a) Verbal b) Semantic c) Oral d) Non-verbal issues.
2. The important factors of communication are _____.
 - a) Content b) Process c) Context d) Conveyance
3. Email filters, spam filters and smart assistants are examples of _____.
 - a) Pocket assistants b) CV c) NLP d) Evaluation
4. What is the main focus of deep learning in AI?
 - a) Creating humanoid robots
 - b) Understanding human emotions
 - c) Mimicking human physical abilities
 - d) Building neural networks
5. What does AI aim to replicate in machines?
 - a) Human emotions b) Human appearance
 - c) Human intelligence d) Human physical strength
6. What are the main goal of Natural Language Processing in AI?
 - a) Creating 3D graphics
 - b) Understanding and interpreting human language
 - c) Identifying pattern in visual data
 - d) Analyzing historical data
7. _____ are used to keep a record of the communication for future reference.
 - a) Spoken words b) Hand movements c) written words d) Gesture
8. Search engines not only predict what popular searches may apply to your query as you start typing, but they also look at the whole picture and recognize what you are trying to say rather than the exact search words. This is an example of _____.
 - a) Computer vision b) Data science c) Natural Language Processing
 - d) Natural language understanding.
9. What are the two functions of verbal communication?
10. What is an article?
11. What is the difference between sender and receiver?
12. Why is AI access important?
13. Explain any one example of AI bias.
14. Define Interpersonal Intelligence.
- 15. Competency based questions.**

Raju lives at a hostel in Nainital. She calls her father who lives in Delhi, to get his approval for joining karate classes, which are going to start in her school from the next session. However,

due to disruption in the phone line, her father could not reply appropriately. She got very upset. Which other medium can she use to get immediate approval from her father?

INFORMATION TECHNOLOGY

Answer the following questions-

1. What is the primary purpose of communication?
a) To express oneself b) To exchange information c) To persuade others d) All of the above
2. Which of the following is a barrier to effective communication?
a) Active listening b) Clear language c) Noise d) Mutual understanding
3. What is self-management?
a) Managing others effectively b) Managing one's emotions and behaviors
c) Managing time only d) None of the above
4. A _____ is a set of formats that you can apply to selected pages, text, frames.
a) Style b) Template c) Image d) Graphic
5. Which of the style include header and footers, border, margins.
a) Character Style b) Page Style c) Frame style d) Presentation Style
6. What is the shortcut for opening styles and formatting window?
a) F12 b) F8 c) F11 d) F10
7. Fill Format mode help to apply styles to many different areas quickly. (T/F)
8. To quit Fill Format mode press the _____ key.
a) Enter b) Ctrl c) Shift d) Escape

Answer the following questions-

9. Define self-management in your own words.
10. Why is self-management important for personal growth and success?
11. Identify and explain three common barriers to effective communication.
12. How do you insert an image? How do you crop it?
13. How can we create our own styles?
14. List any three methods of inserting images in a text document
15. Elaborate four different types of styles which can be provided in a Word Processor.
16. What are document templates? State the purpose of using document template.

(N.B- Do your AI and IT worksheet work in your respective notebooks)


ART EDUCATION

S.NO.	TOPIC
1.	On an A4 size white sheets, draw and color the following topics: a) Flowers b) Madhubani Painting

c) Warli art



WORK EDUCATION

S.NO.	TOPIC
1.	Make any 1 Glass Painting from the following pictures.  

YOGA

1. Explain six types of pranayama and its benefits.
2. What is the history of Yoga?
3. Explain Meaning, Definition and introduction of Yoga.
4. Explain Yogic management of stress.
5. What is Asthanga Yoga?
6. Explain any two asanas with their benefits and precautions.

(N.B- Students will make the yoga portfolio in A4 size sheets, Minimum sheets – 12)

PHYSICAL EDUCATION (HPE Portfolio)

A) Athletics:- (Any 4)

1. Running
2. Long Jump
3. High Jump
4. Shot Put
5. Discus Throw
6. Javelin Throw

B) Team Games:- (Any 2)

1. Basketball
2. Football

3. Table Tennis
4. Badminton
5. Volleyball
6. Kho-Kho

C) Adventure Sports:- (Any 2)

1. Skating
2. Wrestling
3. Boxing