

BISHOP SCOTT
SENIOR SECONDARY GIRLS' SCHOOL

HOLIDAY HOMEWORK
2026-27

GRADE -IX

✦ "Learning never stops, even on holidays!" ✦




SESSION: 2026-2027

DEAR PARENTS

Vacation is the time for children to explore their myriad interests and indulge in various activities which would lead to their all-round development.

Summer Vacation is the most awaited time for both parents and kids. We have tried to keep the homework simple, informative, interesting, and fun-filled.

Here are a few tips for parents to act as facilitators to help your child balance her eagerness in pursuing adventure, creativity, and self-expression with the development of responsibility:

- ***Make sure that you are spending quality time with your wards.***
- ***Teach them the importance of moral values in their lives.***
- ***Motivate them to read good books.***
- ***Encourage and help your child in shouldering responsibilities in household chores. It will aid them to be independent.***
- ***Keeping in view the prevailing situation, indulge yourself in various indoor games with them.***
- ***Encourage the child to wish 'Good Morning' and 'Good Night' to everybody.***
- ***Encourage the child to speak simple sentences in English.***
- ***Talk respectfully with the child and encourage your child to do the same.***
- ***Motivate the child to use polite words such as 'Please', 'Thank You', 'Sorry', 'May I...?'.
***
- ***Revise the work done in the classes.***

Please note: *Prepare a systematic timetable and follow it religiously from the very first day. Allow them to complete homework on their own under your guidance. Make these holidays memorable for the young learners by providing a nurtured and stimulated environment at home which is full of fun, excitement, and learning. Wish you all a safe and healthy holiday ahead!*



HOLIDAY

Homework



SUBJECT WISE HOLIDAY HOMEWORK

GRADE 9 /SUBJECT: ENGLISH

A. Answer the following questions.

1. What does learning symbolize in the story ‘ How I taught my grandmother to read’?
2. Describe the relationship between the narrator and grandmother.
3. What would have happened if the grandmother never learned to read?
4. Identify a moment of transformation in the story.
5. How is pride shown without arrogance in the poem?(Bharat our Land)
6. Compare the poem’s idea of India with today’s reality.
7. Identify one line that reflects unity and explain it.
8. How can young people contribute to the vision shown in the poem?
9. What does independence mean in the story?(How I taught my grandmother to read)
10. Select the correct option to complete the sentence for a report on climate change:"Over the last decade, researchers _____ that the melting of Himalayan glaciers is accelerating at an alarming rate."
(a) observe (b) are observing (c) have observed (d) observe
11. Dialogue Completion
Sunita: Why didn't you join the online seminar yesterday?
Rahul: I _____ for my math entrance exam when the link was sent, so I missed it.
(a) studied (b) have been studying (c) was studying (d) am studying
12. Identify the error in the following sentence from a travel brochure and supply the correction:
"Neither the guide nor the tourists was aware of the sudden change in the weather conditions during the trek."
13. Complete the formal letter opening by fill the correct form of tense:
"I _____ (write) to you today to express my concern regarding the irregular water supply in our locality, which _____ (cause) immense hardship for the past two weeks."
14. Which of the following sentences adheres to the rules of Subject-Verb Agreement?
(a) Economics are a challenging subject for many students in high school.
(b) Five kilometers are a long distance to walk in this heat.
(c) The jury has reached a unanimous decision regarding the verdict.
(d) A variety of music styles was performed at the annual function.
15. Fill in the blanks with the appropriate forms of the words in brackets:
"The increase in digital literacy _____ (lead) to a shift in how information is consumed. Today, a large number of people _____ (prefer) reading news on apps rather than physical newspapers."

B. PORTFOLIO

ART-INTEGRATED PROJECT – ENGLISH (GRADE 9)

Topic: Mizoram and Tripura

Do the following in a project file:

1. Make a creative cover page using designs inspired by Mizoram or Tripura.
2. Write a short introduction (100–150 words) on how culture influences language and stories.
3. Write about the culture of Mizoram and Tripura (festivals, lifestyle, language).
4. Find one folktale from Mizoram and one from Tripura.

Write a short summary of each.

Mention the moral of each story.

5. Convert ANY ONE folktale into a comic strip or draw scenes from the story.
6. Do ONE creative task (choose any one):

Write a poem on “Life in Mizoram or Tripura”

OR

Write a short dialogue between two people from different states

7. Write 150 words comparing Mizoram/Tripura with Bihar (similarities or differences).

LITERATURE-BASED

1. Both texts(How I taught my grandmother to read and Bharat our land) highlight *growth and identity*. Compare how these ideas are shown.
2. Which text had a stronger impact on you and why? Support with reasoning.

कक्षा- नवम / विषय- हिन्दी

परियोजना कार्य

1. छात्राएं “मिजोरम और त्रिपुरा की संस्कृति, भाषा एवं जीवन शैली” का अध्ययन” करेंगी और नीचे दिए गए मुख्य बिन्दुओं के आधार पर एक परियोजना तैयार करेंगी |

परियोजना के लिए निर्देश:

- राज्य का परिचय (स्थान, राजधानी)
- भाषा और वेशभूषा
- खान-पान
- त्योहार और संस्कृति
- विशेषताएँ / रोचक तथ्य

नोट:

- 1. दिए गए परियोजना कार्य को A4 साइज पेपर में पूरा करें।
- 2. मुख्य पृष्ठ(कवर पेज) आकर्षक,चित्रात्मक ,रचनात्मक एवम् सुंदर ढंग से तैयार करें जिसमें आपका नाम, वर्ग, विभाग, अनुक्रमांक, विषय इत्यादि साफ एवम् स्पष्ट शब्दों में अंकित होने चाहिए।
- 3. परियोजना कार्य में स्वीकृति पत्र, प्रमाणपत्र, आभारोक्ति, विषय-सूची, प्रस्तावना आदि संलग्न होने चाहिए।
- 4. परियोजना कार्य विषय से संबंधित एवम् सार गर्भित होने चाहिए।

2. निम्नलिखित प्रश्नों के उत्तर के लिए सही विकल्प चुनिए :-

1. कहानी में हीरा और मोती का आपसी संबंध किस गुण को मुख्य रूप से दर्शाता है?
(क) प्रतिस्पर्धा और प्रतिद्वंद्विता (ख) एकता और सहयोग
(ग) गर्व और दंभ (घ) विद्रोह और क्रोध
2. हीरा-मोती ने नया स्थान स्वीकार क्यों नहीं किया?
(क) उन्हें भरपेट भोजन दिया गया। (ख) उन्हें बहुत मोटी रस्सी से बाँधा गया।
(ग) मालिक ने बेचा, यह सोचकर उन्हें अपमान लगा। (घ) उन्हें अलग-अलग बाँधा गया।
3. बैलों ने रस्सी तोड़कर घर लौटने का निर्णय क्यों लिया?
(क) कष्टों से बचने के लिए (ख) स्वतंत्रता प्राप्त करने के लिए
(ग) अभिमान की रक्षा के लिए (घ) अपनापन पाने के लिए
4. गया द्वारा डंडे से मारने पर मोती का आक्रोश किस मानवीय मनोवृत्ति का द्योतक है?
(क) स्वाभिमान (ख) अहिंसा (ग) पराधीनता (घ) अन्याय की रक्षा
5. कथन (A) हीरा और मोती ने नए मालिक के यहाँ रहने से इंकार कर दिया।
कारण (R): क्योंकि वे अपने पुराने मालिक के प्रति अत्यंत निष्ठावान और स्नेही थे।
(क) (A) और (R) दोनों सही हैं तथा (R,) (A) की सही व्याख्या है।
(ख) कथन (A) और कारण (R) दोनों सही हैं, परंतु (R,) कथन (A) की सही व्याख्या नहीं है।
(ग) कथन (A) सही है, पर कारण (R) गलत है।
(घ) कथन (A) गलत है, पर कारण (R) सही है।
6. "अब कैसे छूटे राम रट लगी पंक्ति का भाव है?
(क) नाम उच्चारण की कठिनाई (ख) नाम रटकर याद करना
(ग) आराध्य का नाम जपना (घ) मित्रों का नाम रटना
7. "प्रभु जी तुम चंदन हम पानी" पंक्ति में आराध्य और भक्त का संबंध किस रूप में व्यक्त हुआ है।
(क) एकाकार और समरूप (ख) तरल और तीव्र सुगंध
(ग) आश्रय और आश्रित (घ) द्रव और ठोस
8. "तुम दीपक, हम बाती" से रैदास का क्या भाव है?
(क) दीपक और बाती का कोई मेल नहीं होता है। (ख) दीपक बिना बाती भी जल सकता है।
(ग) भक्त आराध्य से अधिक महत्वपूर्ण है। (घ) भक्त का आराध्य से मेल जीवन को आलोकित करता है।
9. "जो तुम तोरी राम मैं नहिं तोरी" पंक्ति में रैदास का क्या आशय है?
(क) परोपकारी भक्ति भाव (ख) आराध्य से अटूट संबंध
(ग) सांसारिक मोह (ग) तीर्थ जाने से मुक्ति निश्चित है।
(घ) आराध्य के चरणों में सच्चा आश्रय है।
10. कथन (A) "अब कैसे छूटे राम रट लगी" पंक्ति में भक्त की ईश्वर के प्रति गहरी आसक्ति व्यक्त होती है।
कारण (R): क्योंकि भक्त निरंतर अपने आराध्य का नाम जपता है और उससे जुड़ाव महसूस करता है।
(क) कथन (A) और कारण (R) दोनों सही हैं तथा R, A की सही व्याख्या है।
(ख) कथन (A) और कारण (R) दोनों सही हैं, परंतु R, A की सही व्याख्या नहीं है।
(ग) कथन (A) सही है, पर कारण (R) गलत है।
(घ) कथन (A) गलत है, पर कारण (R) सही है।
3. "वह अपना धर्म छोड़ दे लेकिन हम अपना धर्म क्यों छोड़ें!" कहानी के अनुसार हीरा और मोती सदैव ध्यान रखते थे कि कौन-से कार्य करने योग्य है। कौन-से नहीं। वे कौन-कौन से कार्य कभी नहीं करते थे?
4. "गिरे हुए बैरी पर सींग न चलाना चाहिए।" "लेकिन औरत जात पर सींग चलाना मना है, यह भूले जाते हो।" हीरा के ये कथन किन भारतीय मूल्यों की ओर संकेत करते हैं?
5. "बैलों ने जैसे पाँव न उठाने की कसम खा ली थी।"
'अत्याचार सहना भी अन्याय में भागीदारी है' क्या आप इस कथन से सहमत हैं? अपने उत्तर के कारण भी बताइए।

6. "बहुत दिनों साथ रहते-रहते दोनों में भाईचारा हो गया था।" हीरा और मोती अभिन्न मित्र थे। कहानी की किन-किन घटनाओं के आधार पर यह निष्कर्ष निकाला जा सकता है? कम से कम तीन बिंदु लिखिए।
7. "उसी समय मालकिन ने आकर दोनों के माथे चूम लिए।" कहानी में मालकिन और छोटी लड़की, दोनों के व्यवहार की तुलना कीजिए।
8. "उसने उनके माथे सहलाए और बोली - खोले देती हूं। चुपके से भाग जाओ...." यदि आप छोटी लड़की होते, तो बैलों की मदद किस प्रकार करते हैं?

केस-आधारित प्रश्न (8)

9. "दोनों गधे अभी तक ज्यों-के-त्यों खड़े थे?" यह वाक्य मानव स्वभाव में छिपे भय और संकोच को दर्शाता है। कई बार व्यक्ति अवसर मिलने पर भी आगे बढ़ने से डरता है।

प्रश्न: 1. इस कथन से मानव स्वभाव की कौन-सी कमजोरी सामने आती है?

10. "दोस्तों में घनिष्ठता होते ही धोल-धप्पा होने लगता है।" यह कथन बताता है कि सच्ची मित्रता में औपचारिकता कम हो जाती है और अपनापन बढ़ जाता है।

प्रश्न: 1. क्या आप मानते हैं कि घनिष्ठता से संबंध मजबूत होते हैं? क्यों?

(नोट : प्रश्न संख्या 2 से 10 तक साहित्य कॉपी में लिखना है)

व्याकरण-

11. कहानी 'दो बैलों की कथा' में से चुनकर कुछ वाक्य नीचे दिए गए हैं। इन वाक्यों में मुहावरे को पहचान कर रेखांकित कीजिए। इन मुहावरों का प्रयोग करते हुए नए वाक्य बनाकर लिखिए-

1. "झूरी के साले गया को घर तक गोई ले जाने में दाँतों पसीना आ गया।"
2. "उसका चेहरा देखकर अंतर्ज्ञान से दोनों मित्रों के दिल काँप उठे।"
3. "झूरी की स्त्री ने बैलों को द्वार पर देखा, तो जल उठी।"
4. "मोती दिल में ऐंठकर रह गया।"
5. "आएगा तो दूर ही से खबर लूँगा। देखें कैसे ले जाता है।"

रचनात्मक (10)

12. मान लीजिए आप एक स्थानीय समाचार पत्र के संवाददाता हैं। अपने समाचार पत्र के लिए बैलों के कॉजीहाउस से भागने का समाचार लिखिए।

13. चित्रकथा लेखन

नीचे 'दो बैलों की कथा' की एक घटना को चित्रकथा के रूप में दिया गया है। इन घटनाओं को पहचानिए। प्रत्येक घटना के लिए उपयुक्त संवाद और घटनाक्रम बताने वाले वाक्य लिखिए।

कैसे लिखें-

- हर चित्र के लिए एक छोटा संवाद बनाकर लिखिए।
- दृश्य का क्रम- बंद करना, भागने की योजना, दीवार तोड़ना, आजादी।



(नोट : प्रश्न संख्या 11 से 13 तक व्याकरण कॉपी में लिखना है)

General instructions:

- Solve all questions in a separate notebook.
- Bring the completed work when school reopens.
- Marks will be awarded for neatness and accuracy.
- Use proper mathematical notations and steps.

1: Multiple Choice Questions:

- (i) The ordinate of every point on the x-axis is
 (a) 1 (b) -1 (c) 0 (d) any real number
- (ii) The mid-point of segment AB is P(0,4). If the coordinates of B are (-2,3) then the coordinates of A are
 (a) (2,5) (b) (-2, -5) (c) (2,9) (d) (-2,11)
- (iii) Which of the following is a linear polynomial?
 (a) $x + 4$ (b) $x^3 + x$ (c) $x^3 + 2x + 6$ (d) x^2
- (iv) If $p(x) = x + 4$, then $p(x) + p(-x) = ?$
 (a) 0 (b) 4 (c) 2x (d) 8
- (v) The degree of the polynomial $y^3(1 - y^4)$
 (a) 6 (b) 8 (c) 7 (d) 5
- (vi) Coefficient of x in the polynomial $(2x - 5)(2x^2 - 3x + 1)$
 (a) 15 (b) 16 (c) 17 (d) 18
- (vii) If $x > 0$ and $y < 0$ then the point (x, y) lies in the quadrant
 (a) I (b) II (c) III (d) IV
- (viii) The distance of the point $P(-6,8)$ from the origin is
 (a) 8 (b) $2\sqrt{7}$ (c) 6 (d) 10

Assertion-Reason Questions

- A. Both Assertion and Reason are true and Reason is the correct explanation of Assertion
 B. Both Assertion and Reason are true but Reason is not the correct explanation of Assertion
 C. Assertion is true but Reason is false
 D. Assertion is false but Reason is true
- (ix) Assertion: The graph of $y = a$ is a line parallel to the x-axis
 Reason: $x = 0$ represents the x-axis
- (x) Assertion: A polynomial $p(x) = x^3 + 5x - 6x^4 + 9x$ is a polynomial in standard form.
 Reason: A polynomial in “x” is said to be in standard form if it’s variable “x” has powers, either in ascending order or in descending order.

Very Short Questions:

2. Verify if $\frac{2}{5}$ is a zero of the polynomial $p(x) = x - 4$
3. Find the distance between the points P (-4,7) and Q (2,-5) using distance formula.
4. Find the zeros of the polynomial $q(x) = 15x^2 + 2x - 8$
5. Locate the points A (3,4) and B (-3, -4) on the graph paper. Is the line obtained parallel to x-axis?
6. Fill in the blanks:
 (a) The number of zeros of a polynomial cannot exceed its
- (b) A constant polynomial does not have any

Short Questions:

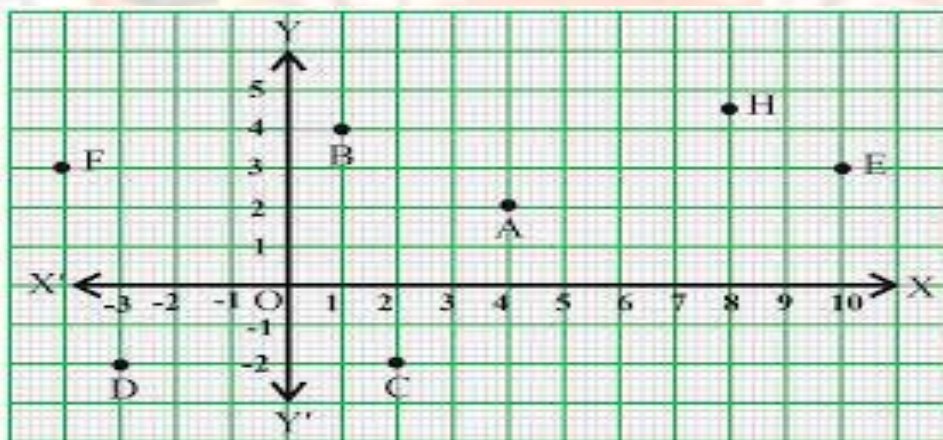
7. Show that the points $A(-5,6)$, $B(3,0)$, $C(9,8)$ are the vertices of an isosceles right angled triangle.
8. Three vertices of the rectangle $ABCD$ are $A(2,2)$, $B(-3,2)$, $C(-3,5)$. Plot these points and find point D . Also find the area of rectangle $ABCD$.
9. Points $A(-1, -1)$ and $B(5,7)$ lie on a circle with centre $O(2, -3y)$. Find the value of y and hence find the radius of the circle.
10. If 2 and 0 are the zeros of $p(x) = 2x^3 - 5x^2 + ax + b$ then find the values of a and b .
11. If the point $P(x, y)$ is equidistant from the points $A(5,1)$ and $B(-1,5)$, prove that $3x = 2y$

Long Questions:

12. Define the terms and explain with help of its graph:
(a) Linear Pattern (b) Linear Growth & Decay
13. What do you mean by Linear Relationship? Explain it with the help of an example using the equation of a line $\Rightarrow y = ax + b$ where, 'a' is the slope and 'b' is the intercept of the line on $Y - axis$.

Case Study Questions

14. On one day, principal of a particular school visited the classroom. Class teacher was teaching the concept of polynomial to students. He was very much impressed by her way of teaching. To check, whether the students also understand the concept taught by her or not, he asked various questions to students. Some of them are given below. Answer them.
(a) Which of the following is not a Polynomial?
(i) $4x^2 + 2x - 1$ (ii) $y + \left(\frac{3}{y}\right)$ (iii) $x^3 - 1$ (iv) $y^2 + 5y + 1$
(b) The polynomial of the type $ax^3 + bx^2 + cx$, where $a \neq 0$ is called **(On the basis of degree)?**
(c) The value of k , if $(x - 1)$ is a factor of $4x^3 + 3x^2 - 4x + k$, will be?
(d) The maximum number of zeroes of the polynomial $x^5 + 4x^3 + 2$ is
15. Student of class IX are on visit of Sansad Bhawan. Teacher assigned them the activity to observe and take some pictures to analyse the seating arrangement between various MPs and speakers based on coordinate geometry. The staff tour guide explained various facts related to Mathematics of Sansad Bhawan to the students, they were surprised when teacher asked them that they now need to apply coordinate geometry on the seating arrangement of MP's and speakers. Refer to the below image and graph.



Answer the following questions:

- (i) Find the perpendicular distance of the point E from the $y - axis$.
- (ii) In which quadrant, the point 'C' lies?
- (iii) Write the coordinates and Quadrant of the mirror image of point A along $x - axis$?

ART INTEGRATED PROJECT:

Make a project file on the topic: “Mathematical Patterns in the Cultural Art and Architecture of Tripura and Mizoram” with the following objective:

- To explore the cultural heritage of Tripura and Mizoram through art forms and architecture.
 - To understand the application of polynomials in pattern formation.
 - To apply real numbers in measurement and design analysis.
 - To develop analytical and creative thinking skills.
-
-

HHW / GRADE IX / ICT

Summer Holiday Homework

Subject: IT-402

Class: IX

Welcome to your Summer Portfolio Challenge! This project is designed to help you combine your creative thinking with professional IT and communication skills. You will act as an entrepreneur launching a new startup and document your process.

Phase 1: Communication Strategy

Before you build your document, you need to define your business voice. Complete the following tasks:

- The Elevator Pitch: Write a 100-word paragraph describing your startup. What problem does it solve?
- Customer FAQ: Create a list of 5 common questions customers might ask and provide clear, professional answers.
- The Outreach Email: Draft a formal email to a potential partner or investor proposing a collaboration.

Phase 2: Digital Documentation

Compile your work into a professional "Company Handbook" using a word processor. Your document must include the following:

- Document Structure: Use Heading 1 and Heading 2 styles to organize your sections.
- Table of Contents: Generate an automatic Table of Contents at the beginning of the file.
- Visuals: Include at least two relevant images (logos, product photos, or sketches) with captions.
- Data Representation: Create a table showing a sample 1-week schedule or a simple price list.
- Headers/Footers: Add a header with the company name and a footer with your name and page numbers.
- Polish: Use the Spelling and Grammar check tool before saving.

Submission Checklist

Before submitting your file, ensure you have:

- Saved the file as: Startup_Portfolio_YourName.docx
- Checked that all Headings are correctly formatted.
- Verified that the Table of Contents works (Ctrl+Click to test).
- Included all three communication components (Pitch, FAQ, Email).

(I) Art integrated project

Biology :

“Medicinal Plants of Mizoram and Tripura and Their Uses”

Chemistry :

“Natural Resources and Their Chemical Composition in Mizoram and Tripura”

Physics :

“Motion on Hills: Study of Speed and Acceleration in Hilly Regions”

Project Structure:(For each - Bio, Chem, Phy)

- Title Page (Project Name, Student Name, Roll No., School Name)
- Certificate & Acknowledgement
- Introduction (Background & relevance to the state)
- Objective
- Methodology (data collection methods)
- Observations/Data Analysis (charts/graphs/findings)
- Conclusion
- Bibliography

(II) Write the answer of these questions in Chemistry notebook :

1. Which of the following mixtures are correctly classified as homogeneous (Hm) and heterogeneous (Ht)? Choose the correct option.

- (i) Air — Hm, Milk — Ht, Sugar solution — Hm, Smoke — Hm
- (ii) Brass — Ht, Fog — Ht, Vinegar — Ht, Muddy water — Hm
- (iii) Copper sulfate solution — Hm, Salt solution — Hm, Milk — Hm, Bronze — Hm
- (iv) Muddy water — Ht, Milk — Ht, Blood — Ht, Brass — Hm

2. Choose the correct options, and explain the reason for the correct and incorrect options.

Which among the following mixtures show the Tyndall Effect?

A mixture of:

- (a) air and dust particles
 - (b) copper sulfate and water
 - (c) starch and water
 - (d) acetone and water
- (i) a and b (ii) b and d (iii) a and c (iv) c and d

3. Solve the following problems:

(i) A cake recipe uses dry ingredients, namely 75 g of sugar for 420 g of all-purpose flour and 5 g of sodium hydrogencarbonate.

Express the concentration of each component in the mixture using an appropriate method.

(ii) A brass alloy contains 70% copper by mass. Calculate the quantities of copper and zinc present in 120 g of brass.

4. The label on a cooking oil pack says one litre (910 g). If this oil is mixed with water, will it form a separate layer? If so, which substance will be on top? How will you separate the two layers? Also, draw the diagram of the apparatus used.

5. Two miscible liquids, A and B, are present in a mixture. The boiling point of A is 60 °C and the boiling point of B is 90 °C. Suggest a method to separate them. Also, draw a labelled diagram of the method suggested.

6. Compare evaporation, crystallization and distillation. In which situation, would you prefer each of these over the others?
7. Blood is an example of a colloidal mixture. (i) What would happen if blood behaved like a true suspension inside the body? (ii) In a blood sample, identify the dispersed phase and the dispersion medium.
8. Why is distillation an effective method for separating a mixture of water and acetone?
9. Three students, A, B and C, are preparing sugar solutions for an experiment:
 - Student A dissolves 20 g of sugar in 80 g of water.
 - Student B dissolves 20 g of sugar in 100 g of water.
 - Student C dissolves 30 g of sugar in 80 g of water.(i) Calculate the mass percentage (% m/m) concentration of sugar in each student's solution.
(ii) Whose solution is the most concentrated? Explain why?

Write the answer of these questions in Bio notebook:

1. Differentiate between the following pairs of terms based on the clues given in parentheses:
 - (i) Cell membrane and cell wall (permeability)
 - (ii) RER and SER (structure)
 - (iii) Chloroplasts and chromoplasts (pigments)
2. Two students, Renu and Rohit, were having a discussion on the plastids.
Renu emphasised that all parts of the plants, even roots, contain plastids. However, Rohit did not agree with the statement and told her that plastids are absent in plant roots since the roots are underground and do not need to perform photosynthesis. Who is correct? Justify your answer.
3. Mitochondria and chloroplasts are two important organelles in a plant cell. Discuss how these two organelles are structurally and functionally similar to each other, and different from each other.
4. What outcome do you expect, if all the mitochondria are removed from a eukaryotic cell?
5. Which phenomenon inhibits the formation of tumors in the human body? Can plants also develop tumors? Explain.

Class 9 Physics Assignment
Chapter: Motion (CBSE Class 9 Syllabus)
Section A: Subject-Based Questions (15 Questions)

Very Short Answer Questions:

1. An object changes its position from point A to point B with respect to a stationary observer. What condition is necessary for the object to be considered in motion?
2. Can a body have zero displacement but non-zero distance travelled? Give one example.
3. A particle moves along a circular path and returns to its starting point. What will be its total displacement?
4. A cyclist covers equal distances in equal intervals of time. Identify the type of motion and state one characteristic of it.
5. Why is velocity considered a vector quantity whereas speed is a scalar quantity?

Short Answer Questions:

6. Distinguish between scalar and vector quantities. Classify distance, displacement, speed, and velocity accordingly.
7. A body travels 40 m in the first 4 seconds and another 40 m in the next 2 seconds. Is the motion uniform? Give reason.
8. A car travels 150 km in the first 3 hours and 90 km in the next 2 hours. Calculate the average speed for the complete journey.

9. Explain why displacement can never be greater than distance travelled.
10. A student walks 80 m north, then 60 m east. Calculate:
 - Total distance travelled
 - Magnitude of displacement
11. Differentiate between uniform velocity and acceleration with suitable examples.
12. A train moving with a velocity of 15 m/s attains a velocity of 35 m/s in 10 seconds. Calculate the acceleration and interpret its meaning.

Long Answer / Numerical Questions:

13. Derive the relation: $v = u + at$ by graphical method. and explain the meaning of each symbol used.
14. A bus initially moving at 10 m/s accelerates uniformly at 2 m/s^2 for 8 seconds. Calculate:
 - Final velocity
 - Distance travelled during this time
15. Draw and explain:
 - Distance–time graph for uniform motion
 - Velocity–time graph for uniformly accelerated motion

Section B: Portfolio Questions (4 Questions)

Questions Based on the Indian States Allocated by CBSE for Bihar (Mizoram and Tripura)

1. Mizoram is a hilly state where vehicles often move on curved roads. Explain how motion on curved roads differs from motion on a straight road.
2. The capital city of Tripura is Agartala. Suppose a vehicle travels 180 km in 4 hours from one town to another. Calculate the average speed of the vehicle.
3. Bamboo transport and road transport are common in parts of Mizoram. Observe any mode of transport used in hilly areas and explain whether the motion is uniform or non-uniform.

Interesting Subject-Based Questions:

4. Why is the motion of the hands of a clock called periodic motion?

Instructions for Students

- Write all answers neatly in your Physics notebook.
- Draw graphs using a ruler and pencil.
- Show complete steps in numerical problems.
- Use SI units in all calculations.
- Submit the assignment on the date assigned by the teacher.

HOLIDAY HOMEWORK / GRADE – IX / SUB — SOCIAL SCIENCE

- 1 . Which of the following is NOT a branch of Social Science?
(a) History (b) Geography (c) Biology (d) Political Science
- 2 . Social Science helps us to understand:
(a) Only the past (b) Only physical environment
(c) Human society and its relationships (d) Only economic activities
- 3 . Which subject studies government and political systems?
(a) Economics (b) History (c) Political Science (d) Geography

4. What is Social Science?
5. Name any two branches of Social Science.
6. Which branch studies the past events of human society?
7. What does Economics deal with?
8. Explain the importance of studying Social Science.
9. Differentiate between History and Geography.
10. How does Political Science help us as citizens?
11. Why is Economics important in daily life?
12. Explain the scope of Social Science and its different branches in detail.
13. Describe how Social Science helps in developing responsible citizens.
14. Discuss the interrelationship between History, Geography, Political Science, and Economics.

Geography

1. Differentiate between **endogenic and exogenic forces**.
2. Explain the process of **weathering** with examples.
3. Describe how **rivers shape the landforms**.
4. What are the different types of **erosion**?
5. Explain the formation of **mountains**.
6. How do **wind and sea waves** change the Earth's surface?
7. What is **soil erosion**, and how can it be prevented?
8. Explain the role of **glaciers** in shaping landscapes.
9. Which force comes from inside the Earth?
(a) Exogenic. (b) Endogenic. (c) Solar (d) Atmospheric
10. Weathering is the process of:
(a) Soil formation (b) Breaking of rocks (c) Movement of rocks (d) Deposition
11. Which agent forms sand dunes?
(a) River (b) Wind (c) Glacier. (d) Sea waves
12. A delta is formed at the:
(a) Source (b) Middle course of river (c) Mouth of river (d) Mountain top
13. Which of the following is a slow process?
(a) Earthquake (b) Volcanic eruption (c) Weathering (d) Landslide

PORTFOLIO

Topic: Manipur and Tripura – Cultural Diversity of Northeast India

Materials Required

A4 or chart paper (white or coloured)

Old magazines, newspapers, printouts, or drawings

Instructions

#Write the heading at the top in bold:

“Manipur and Tripura – Unity in Diversity”

Central Image

#Paste or draw a big picture showing cultural life of Manipur and Tripura

(Example: traditional dance, people in traditional dress, or scenic beauty)

#Supporting Pictures

- Loktak Lake (floating lake)
- Yaoshang or traditional Manipuri dance
- Ujjayanta Palace
- Neermahal Palace (water palace)
- Map of India showing Manipur & Tripura

Creative Borders

#Decorate the border with:

- Bamboo designs
- Tribal patterns
- Floral motifs
- Traditional art forms of Northeast India

Captions & Quotes

Write short slogans or quotes under the images, e.g.:

“Diversity is the beauty of India.”

“Different cultures, one nation.”

“Northeast India – Land of traditions and harmony.”

You can add 4–5 short points:

Manipur:

- Famous for classical dance (Ras Lila)
- Known as “Jewel of India”
- Loktak Lake is the largest freshwater lake

Tripura:

- Known for palaces and bamboo crafts
- Neermahal Palace is built in a lake
- Rich tribal culture and festivals

NOTE : HOMEWORK SHOULD BE DONE IN SUBJECT COPIES.

PORTFOLIO SHOULD BE COVERED WITH BLACK CHART PAPER.

संस्कृत साहित्य (शारदा)

प्रथमः पाठः : सत्यं शिवम् सुन्दरं संस्कृतम्

द्वितीयः पाठः : सुखस्य मूलं धर्मः धर्मस्य मूलम् अर्थं

तृतीयः पाठः : आत्मवत्सर्वभूतेषु यः पश्यति सः पण्डितः

का अभ्यास कार्य उत्तर पुस्तिका में लिखे

व्याकरण

- अपठित गद्यांश पृष्ठ संख्या (14,15,16,17)
- अभ्यास 1 से 5 तक व्याकरण कापी में लिखें
- चित्र वर्णन अभ्यास 1,2 और 3 व्याकरण पुस्तक में लिखें

प्रथमः पाठः : सन्धि कार्य - स्वर सन्धि का अभ्यास पुस्तक में लिखें

द्वितीयः पाठः - शब्दरूपाणि - अभ्यास कार्य पुस्तक में लिखें

