



SAVITRI DEVI DAV PUBLIC SCHOOL, JAMTARA

SUMMER VACATION ASSIGNMENT- (2023-24)

CLASS: IX

SUBJECT: ENGLISH

Assignment 1.

Prepare a travel plan to visit a new place of interest during the upcoming Summer Break. Narrate your experiences of stay at the new place, its special attractions and your interactions with the people living there. Also mention about the weather conditions of the place, its height from the sea level, air temperature including other geographical features of the place. Paste images/ photos of the place/ people as marks of evidence.

(100 words)

Assignment 2.

Prepare a Tense Chart showing Tense and its structures. Give examples of each structure with negative and interrogative sentence patterns.

Assignment 3.

Fill in the blanks applying appropriate tense to the verbs in brackets :

Water _____ (freeze) at 0 degree celsius.

My father _____ (write) an English article at the moment.

All the boarders _____ (sleep) already.

Someone _____ (wait) for you on the corridor since morning.

He _____(sell) his car last week.

It _____ (rain) when I returned home yesterday.

By the time they reached the station, the train _____ (leave).

The traffic dept. _____(launch) new traffic guidelines next week.

The Education Dept. _____(implement) NEP in the country by 2025.

Assignment 4.

Practice the following writing Skill

Article Writing

Exercise

1. Types Of Diet To Follow
2. Makeovers
3. Yoga And Mind Healing
4. Importance of mental health

Assignment 5.

1. Read the poems

The Road Not Taken

The Wind

Now try to justify the theme of the two poems

2. On the basis of reading the poem "The Road Not Taken" by Robert Frost..pen downHave you ever had to make a difficult choice (or do you think you will have difficult choices to make) ?How will you make the choice(For what reason)...
3. Find out the meaning of
Diverged
Wanted
Sigh
Betcha
Crinkly
Attic

4. A new revised volume of Issac Asimov's short story has just been released. You have already read one of his famous story "The Fun they Had". Order one set. Write a letter to the publisher, Mindframe Private Limited, 1632 Asaf Ali Road New Delhi, requesting that a set be send to you by value payable POST (VPP) and giving your address.

SUBJECT: HINDI

1. 'मेहनत का फल' और 'शिष्टाचार का परिणाम' विषयों पर लघुकथा लिखें।
2. तेलंगाना राज्य की किन्हीं तीन लोककथाओं को उपयुक्त चित्रांकन के साथ लिखें।
3. 'जानलेवा गर्मी' और 'भीषण बरसात में' विषयों पर रिपोर्टाज लिखें।
4. ग्रीष्म ऋतु पर आधारित पाँच कविताओं को संग्रहित करें एवं स्वयं से दो कविताएँ लिखें।

(सभी रचनाएँ ए-4 साइज पेज पर लिखकर एक ही चैनल फ़ाइल में जमा करें।)

SUBJECT: SANSKRIT

1. एकपदेन उत्तरत - -

- (क) सहसा किं न विदधीत्?
- (ख) सुस्थः कः आसीत्?
- (ग) ब्राह्मणस्य चरणयोः कः अलुठत्?
- (घ) माधवः नाम विप्रः कुत्र वसति स्म?
- (ङ) गद्ये/कथायां ब्राह्मणः पुत्रनिर्विशेषं कं मन्यते ?

2. पूर्णवाक्येन उत्तरत -

- (क) ब्राह्मणः कथं परं विषादम् अगच्छत्?
- (ख) गद्ये उपकारकः कः अस्ति?
- (ग) कृष्णसर्पः केन दृष्टः?

3. निर्देशानुसारम् उत्तरत - - '

- (क) 'नीत्वा' इत्यर्थे गद्ये किं पदं प्रयुक्तम्?
- (ख) 'कालः पिबति तद्रसम्' अत्र विशेषणपदं किम्?
- (ग) 'अस्वस्थः' इति पदस्य गद्ये विलोमपदं किम्?
- (घ) 'शीघ्रम्' इति पदस्य द्वौ पर्यायपदं गद्यात् चित्वा लिखत।
- (ङ) "बालस्य अत्र रक्षकः नास्ति" अत्र वाक्ये कर्तृपदं किम् ?
- (च) 'ब्राह्मणस्य भार्या स्नातुं गता' अत्र क्रियापदं किम्?

4. रेखांकितपदानाम् आधृत्य प्रश्ननिर्माणं कुरुत।

- (क) नेपालदेशे जनकपुरम् नाम नगरम् अस्ति।
- (ख) ब्राह्मणः राज्ञा श्राद्धार्थं निमंत्रितः
- (ग) ब्राह्मणः गृहम् उपावृतः।
- (घ) ब्राह्मणः कोपात् नकुलं व्यापादितवान्।
- (ङ) अविवेकः परम आपदां पदम्।

5.संधि व संधिविच्छेदं कुरुत।

- i) (क) हितोपदेशः (ख) स्वबालापत्यस्य (ग) राजेशः
(घ) अद्यैव (ङ) नदीशः (च) धनार्थी
(छ) रमेशः (ज) लघूत्सवः (झ) राजर्षिः (ञ) एवैषः
- ii) (क) लम्ब + उदरः (ख) उप+इन्द्रः (ग) न+एकः
(घ) अद्य + अवकाशः (ङ) एक + एकमपि (च) तथा + अपि
(छ) फल + उदगमैः (ज) ग्रीष्म + ऋतुः (झ) बालस्य + अत्र (ञ) न+एवम्

6. परियोजना कार्यम् (Art Integration) झारखण्ड राज्य को तेलंगणा राज्य से संकेत बिन्दु: ---

- i) परिचयः (introduction)
ii) क्षेत्रफल (area)
iii) बोली (language)
iv) खान-पान
v) वेश-भूषा
vi) जनसंख्या
vii) जलवायु
viii) शिक्षा

SUBJECT: MATHEMATICS

- 1) Find a rational number between -2 and 6.
- 2) Insert 10 rational numbers between $-3/11$ and $8/11$.
- 3) Express $2157/625$ in the decimal form.
- 4) Express $0.5(\text{bar})$ in the form of P/q .
- 5) Define an irrational number and rational number.
- 6) Find three different irrational numbers between the rational numbers $5/7$ and $9/11$.
- 7) Find the value of $0.23(\text{bar}) + 0.22(\text{bar})$.
- 8) Evaluate $(2/11)^4 \times (11/3)^2 \times (3/2)^3$.
- 9) Find the value of X if $5^{x-3} \times 3^{2x-8} = 225$.
- 10) If $\sqrt{3} - 1/\sqrt{3} + 1 = a + b\sqrt{3}$ find a and b .
- 11) Simplify $(4 + \sqrt{5}/4 - \sqrt{5}) + (4 - \sqrt{5}/4 + \sqrt{5})$.
- 12) If $X = 3 - 2\sqrt{2}$ find $x^2 + 1/x^2$.
- 13) Evaluate each of the following Using identities:
(a) 991×1009 (b) 117×83
- 14) Write the following in expanded form:
(a) $(-x + 2y + z)^2$ (b) $(x - 2y - 3z)^2$
- 15) If $a + b = 10$ and $ab = 21$ find the value of $a^3 + b^3$.
- 16) Evaluate $25^3 - 75^3 + 50^3$.
- 17) If $a - b = 5$ and $ab = 12$ find the value of $a^2 + b^2$.
- 18) Factorize: $p^6 - (512q)^6$
- 19) Factorize: $(X + y)^3 - (x - 1)^3$.
- 20) Find the value of 'a', if $x - a$ is a factor of $x^3 - a^2x + X + 2$.
- 21) If both $x - 2$ and $x - 1/2$ are factors of $px^2 + 5x + r$, show that $P = r$.
- 22) Find the value of 'a' such that $(x - 4)$ is a factor of $5x^3 - 7x^2 - ax - 28$.

- 23) Factorize: $x^2 - \sqrt{3}x - 6$.
- 24) If $X+Y+Z=1$, $xy+yz+zx=-1$ and $xyz=-1$, find the value of $x^3+y^3+z^3$.
- 25) Factorize: x^3+x-3x^2-3 .
- 26) Activity 3- verify the algebraic identity $(a+b)^3=a^3+b^3+3a^2b+3ab^2$.

SCIENCE

SUBJECT: PHYSICS

A. Answer the following questions:-

1. Define physical quantities. Define scalar and vector quantities with examples.
2. Define rest and motion.
3. What are the differences between distance and displacement?
4. Define Speed. What is the S.I. unit of Speed? Also define the average speed.
5. Define uniform and non-uniform motion.
6. A truck decreases its speed from 60 k.m./hour to 40 k.m./hour in 5 seconds. Find the acceleration produced and distance travelled by the truck in above said period.
7. A cycle starts from the rest and attains the speed of 6 m/s in 5 seconds. Find the acceleration produced and distance travelled by the cycle in above said period.
8. Prove second equation of motion by graphical method.

SUBJECT: CHEMISTRY

1. How is ammonia gas liquefied?
2. Why does the temperature remain constant during the melting of ice even though heat is supplied continuously?

CASE BASED : Read the following and answer the related MCQ.

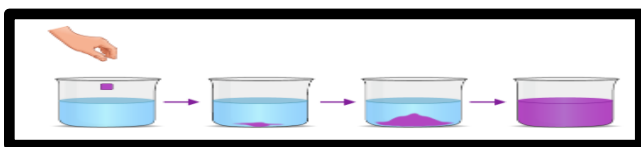
What happens inside the matter during change of state? On increasing the temperature of solids, the kinetic energy of the particles increases. Due to the increase in kinetic energy, the particles start vibrating with greater speed. The energy supplied by heat overcomes the forces of attraction between the particles. The particles leave their fixed positions and start moving more freely. A stage is reached when the solid melts and is converted to a liquid. The minimum temperature at which a solid melts to become a liquid at the atmospheric pressure is called its melting point.

The temperature of the system does not change after the melting point is reached, till all the ice melts. This happens even though we continue to heat the beaker, that is, we continue to supply heat. This heat gets used up in changing the state by overcoming the forces of attraction between the particles. The amount of heat energy that is required to change 1 kg of a solid into liquid at atmospheric pressure at its melting point is known as the latent heat of fusion. So, particles in water at 00 C (273 K) have more energy as compared to particles in ice at the same temperature.

The temperature at which a liquid starts boiling at the atmospheric pressure is known as its boiling point. Boiling is a bulk phenomenon. Particles from the bulk of the liquid gain enough energy to change into the vapour state. A change of state directly from solid to gas without changing into liquid state is called sublimation and the direct change of gas to solid without changing into liquid is called deposition.

- i) A change of state directly from solid to gas without changing into liquid state is called

- a) Sublimation
 - b) Deposition
 - c) Boiling point
 - d) None of these
- ii) The direct change of gas to solid without changing into liquid is called
- a) Sublimation
 - b) Deposition
 - c) Boiling point
 - d) None of these
- iii) The energy supplied by heat to solid is used to overcome the forces of attraction between the particles. True or false
- a) True
 - b) False
 - c) None of these
- iv) Define melting point and boiling point
- v) Define latent heat of fusion
3. Observe the diagram and identify the process involved. Define the term .



4. The boiling point of methane is -70°C .It is equivalent to _____ kelvin.
5. Make a project on **Organizational development techniques and opportunities in Jharkhand and Telangana.**

SUBJECT: BIOLOGY

- 1) Enlist the types of Endoplasmic Reticulum.
- 2) Define membrane biogenesis?
- 3) What is an osmotic solution? Explain different types of osmotic solution
- 4) What are the different types of osmosis? Write and draw an activity to show endosmosis.

CASE 1

Plant cells, in addition to the plasma membrane, have another rigid outer covering called the cell wall. The cell wall lies outside the plasma membrane. The plant cell wall is mainly composed of cellulose. Cellulose is a complex substance and provides structural strength to plants. When a living plant cell loses water through osmosis there is shrinkage or contraction of the contents of the cell away from the cell wall. This phenomenon is known as plasmolysis.

- (1) Which of the following is the main constituent of cell wall?
 - (a) Proteins
 - (b) Lipids
 - (c) Lipoproteins
 - (d) Cellulose
- (2) Which of the following is outer most covering of the plant cell?
 - (a) Cell membrane
 - (b) Plasma membrane
 - (c) Cell wall
 - (d) Cellulose
- (3) Choose the correct set of statements from the following.

Statement 1 – Cell wall lies outside the plasma membrane.

Statement 2 – Cell wall is mainly composed of cellulose.

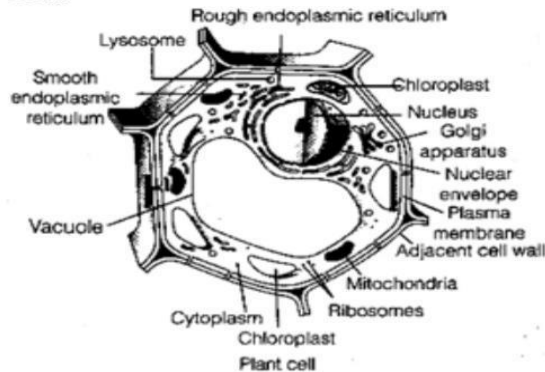
Statement 3 – Cellulose is a complex substance and provides structural strength to plants.

Statement 4 – Cell wall lies outside the plasma membrane.

 - (a) Statement 1 & 3
 - (b) Statement 1 & 2
 - (c) Statement 3 & 4
 - (d) All statement are correct
- (4) What is mean by plasmolysis?
Write and draw an activity to show plasmolysis
- (5) What is the reason behind structural strength of plant cell?

(6)

Read the following and answer the questions from
All the living organisms are made up of cells. It is
cell.



On the basis of given diagram, answer the follow

Which of the following differentiate plant cells from animal cell?

- A) ☐ Large vacuoles, plastid and cell wall
- B) ☐ Cell wall, plastid and centriole
- C) ☐ Cell wall, plastid and mitochondria
- D) ☐ Cell membrane, plastids and cell wall

Chloroplasts found in plant cells

- A) ☐ are colourless plastids
- B) ☐ do not contained DNA
- C) ☐ are involved in storing of starch, oils and proteins
- D) ☐ contain various yellow or orange pigments

Choose the incorrect pair

- A) ☐ Chloroplast-traps light energy
- B) ☐ Leucoplast-stores nutrients
- C) ☐ Chromoplasts-imparts colours to the plant
- D) ☐ None of the above

In plant cells, vacuoles are involved in

- A) ☐ storage of substances
- B) ☐ transport of substances
- C) ☐ expelling excess water
- D) ☐ expelling waste

**The central vacuole of some plant cells may occupy
..... of the cell volume.**

SOCIAL SCIENCE

SUBJECT: HISTORY

1. Choose the correct option

I. Where is the fort of Bastille-

- a. Berlin b. london c. paris d. none

II. Tithes was a tax imposed by-

- a. clergy b. church c. state d. none

III. Liver was a unit of ----- in France.

- a. length b. weight c. currency d. none

IV. Who was the writer of the book 'THE Spirit of the laws' ---

- a. Rousseau b. john Locke c. Montesquieu d. none

2. Why did the peasants of the countryside of France attacked chateaux?

3. What are the natural rights? Define with example.

4. What are the causes of the French Revolution? Also write the immediate cause of the French Revolution.

5. Study the source and answer the questions:

Georges Danton, who later became active in revolutionary politics, wrote to a friend in 1793, looking back upon the time when he had just completed his studies:

'I was educated in the residential college of Plessis. There I was in the company of important men... Once my studies ended, I was left with nothing. I started looking for a post. It was impossible to find one at the law courts in Paris. The choice of a career in the army was not open to me as I was not a noble by birth, nor did I have a patron. The church too could not offer me a refuge. I could not buy an office as I not possess a sou. My old friends turned their backs to me... the system had with education without however offering a field where our talents could be utilized.'

I. Why Georges Danton did not get a job in spite of having talents?

II. What did he do when he couldn't succeed to get job?

6. Project work

Make a PPT on Art Integration under Ek Bharat Shrestha Bharat Programme as a comparative study between the states JHARKHAND & TELANGANA on the following topics:-

1. Historical background of both states

2. Climatic changes, height of the states from sea level, dress, food, agricultural production.

3. Political conditions, government, folk dance, culture.

4. SGDP (state Gross Domestic Product), literacy rate, male literacy, female literacy, employment opportunities.

Note:- It is a common project for all the students of class 9. Each student has to submit an individual PPT. Try to make an attractive ppt.

SUBJECT: CIVICS

Choose the correct option.

1. A democracy must be based on which type of elections?

- a. Proportional Election
b. Free and fair election
c. Both A and B
d. None of these

2. In which one of the following countries women do not have the right to vote?

- a. Pakistan
b. Nepal
c. Afghanistan
d. Saudi Arabia

3. Which form of government requires all citizens to take part in politics?

- a. Monarchy
b. Dictatorship
c. One-party government

- d. Democracy
4. Mexico became independent in
 5. In Robert Mugabe was thrown out of power in Zimbabwe.
 6. What is democracy in simple term?
 7. When did General Musharraf bring back army rule in Pakistan?
 8. How the President of China is elected?
 9. Compare the democratic system in China with that of Mexico.
 10. How does democracy enhance the dignity of citizens?
 11. Is India a democratic country? Write any three arguments in favour of your answer.
 12. Democracy is based on consultation and discussion. Explain this statement.

SUBJECT: GEOGRAPHY

1. Name the eastern coastal state of India.
2. Which is the oldest part of the Indian landmass?
3. What is the latitudinal and longitudinal extent of Jharkhand?
4. How were Lakshadweep islands composed?
5. Why is India called a subcontinent?
6. What is meant by Indian standard time? Why do we need a standard meridian in India?
7. How has India benefited from the opening of the Suez canal?
8. Write some physical features of Jharkhand.
9. Write short notes about Barren island.
10. What is the name of the southernmost point of India ? Why is it not visible today ?

SUBJECT: ECONOMICS

1. Explain the meaning of Economic and non economic activities. Also make a list of economic and non economic activities that you may see in your surroundings during vacations.
 2. You might have got the opportunity to visit your parents village in summer holidays or any town. On the basis of your observation write on following topics.
 1. Education facilities in the village.
 2. Health facilities in the village for the people.
 3. Basic infrastructure of the village.
 4. Different problems faced by the farmers of the village in farming.
 5. What are the facilities used by farmers in irrigation?
 6. Make a list of Non farm activities performed by the people .
 3. Differentiate between modern method of farming and traditional method of farming.
 4. Write a short note on the topics.
 1. Disguised unemployment.
 2. Seasonal unemployment.
 5. Electricity plays an important role in the development of a village. Is the statement correct? Explain.
- Note:- write the answer of the questions on your class economics copy.

PROJECT WORK:- (SOCIAL SCIENCE)

Make a PPT on Art Integration under Ek Bharat Shreshtha Bharat Programme as a comparative study between the states JHARKHAND & TELANGANA on the following topics:-

1. Historical background of both states
2. Climatic changes , height of the states from sea level, dress, food, agricultural production.
3. Political conditions, government, folk dance, culture.
4. SGDP(state Gross Domestic Product), literacy rate, male literacy, female literacy, employment opportunities.

Note:- It is a common project for all the students of class 9. Each student have to submit individual ppt. . Try to make attractive ppt.

SUBJECT: INFORMATION TECHNOLOGY

1. Paste 10 non-verbal images used in public areas like railways, roadways, hospitals, schools, restaurants etc. Also write the uses of it in the channel file.
2. Explain 7 C's of effective communication skills with the help of related images like clear (Lens image) and so on.

SUBJECT: ARTIFICIAL INTELLIGENCE

A.I.

1. Mention the AI tools used in the Following companies and their uses.
(a) Google (b) Amazon (c) Facebook
2. What are chatbots ? Mention any 2 chatbots used in any Field or in any company .
3. Draw/ Paste any one picture from Weak AI, Strong AI, Super AI and write down why they fall in the category of Weak or Strong or Super AI.

Communication Skill-I

1. Explain the types of Communication.
2. Paste 10 non-verbal images used in public areas like railways, roadways, hospitals, schools, restaurants etc. Also write the uses of it in the channel file.
3. Explain 7 C's of effective communication skills with the help of related images like clear (Lens image) and so on.