KENDRIYA VIDYALAYA SUNDERGARH

SUMMER VACATION HOMEWORK
CLASS-9   SUBJECT- ENGLISH

1) Write all textual exercise in fair note book.
   A) How I taught my grandmother to read
   B) Brook poem

2) E-mail writing .

   A) Write an E-mail addressing all students and teachers, and informing them about the fair and informing students about a charity fair that is going to be organised in the school to collect donations for the needy group of people.

   B) Write an e-mail, addressing teachers in-charge of different classes that will participate in the function. Telling the students and teaching faculty of a school about the audition of a dramatics competition to be held after a month or so.

3) Imagine yourself as Gaurav Mallya. Your room-mate Tejas' right hand is plastered as it got fractured while playing badminton in the school. Write a letter to his father informing him about the accident and also asking him not to worry.

4) You are the librarian of Amla Public School. You had placed an order for textbooks with Dhanpati & Sons. As the books did not arrive on time, you have decided to cancel the order. Write a letter to the Manager, Dhanpati & Sons, Chennai, cancelling the order.

5) Write a paragraph about your favourite novel.

6) Write 20 verbs and it's form in past and past participle

7) Write 20 nouns and its feminine gender.

8) Practice exercise on tense of your English Work Book.

9) Write a essay on
   a) A Visit to a Science Exhibition
   b) Side effects of fast food
   c) Pollution: A Threat to Life

Sarita Bisui

.... THANK YOU...........................

कक्षा नवीं (अ/ब)   विषय-हिन्दी

प्र१. हीरा मोती किस प्रकार सहयोग एवं प्रेम करते थे? इससे आपको क्या शिक्षा मिलती है?

प्र२. 'इस जल प्रलय मे' बाढ़ से प्रभावित स्थिति का वर्णन करें।

प्र३. तिब्बत की कानून व्यवस्था उस समय किस प्रकार थी? वर्णन करें।

प्र४. प्रत्यय किसे कहते हैं? उदाहरण थे जे जै-सहित समझाइए।

प्र५. उपसर्ग की परिभाषा देते हुए दो उदाहरण द्वारा अपनी बात स्पष्ट कीजिए।

प्र६. पटाखो से होने वाले प्रदूषण के प्रति ध्यान आकर्षित करते हुए अपने मित्र को पत्र लिखिए।

Pinki Kumari Samanth

KENDRIYA VIDYALAYA SUNDARGARH

HOLIDAY HOMEWORK

Class- IX (A/B)

Subject- Science (Biology)

Q1. Why is cell called the structural and functional unit of life?

Q2. Draw neat and labelled diagram of i) Plant cell   ii) Animal cell

Q3. Write the difference between prokaryotic cell and Eukaryotic cell

Q4. Write the function of the following:

   a) Lysosomes
   b) Mitochondria
   c) Endoplasmic Reticulum

Q5. Cells were first discovered by_____.

Q6. Describe the function of Plasma membrane.

Q7. Plant cell wall is mainly composed of cellulose. True or false.

Q8. Differentiate Diffusion and Osmosis with example

Q9. The Golgi apparatus was first described by_____.
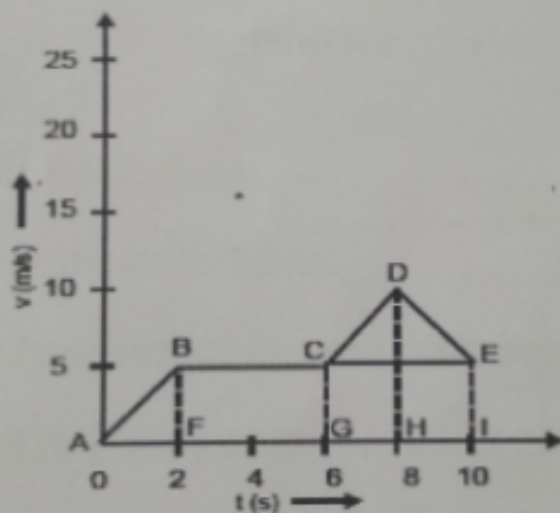
Q10. Define endocytosis?

1.Can the displacement be greater than the distance travelled by an object?

Justify your answer.

2. Define acceleration and state its SI unit. For motion along a straight line, when do we consider the acceleration to be (i) positive (ii) negative? Give an example of a body in uniform acceleration

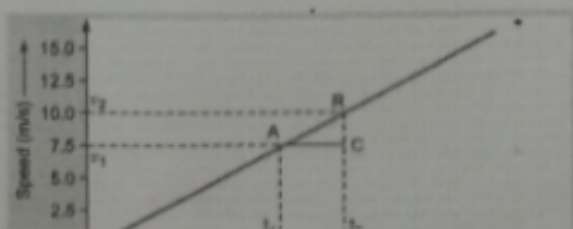3. Find the total displacement of the body from the following graph:

4. Distinguish between uniform motion and non, uniform motion.

5.What can you say about the motion of an object whose distance-time graph is a straight line parallel to the time axis?

6. Give an example of a body that may appear to be moving for one person and stationary for the other

7.Given below is the velocity-time graph for the motion of the car. What does the nature of the graph show ? Also find the acceleration of the car.
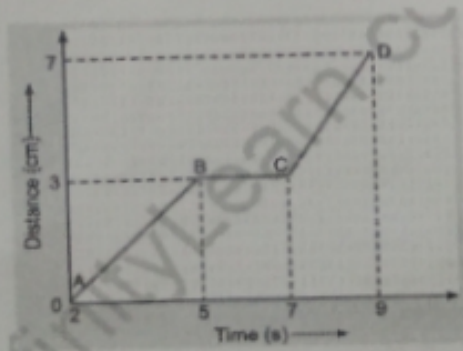
8. The data regarding the motion of two different objects P and Q is given in the following table. Examine them carefully and state whether the motion of the objects is uniform or non-uniform.

Time	Distance travelled by object P in metres	Distance travelled by object Q in metres
9:30 am	10	12
9:45 am	20	19
10:00 am	30	23
10:15 am	40	35
10:15 am	50	37
10:45 am	60	41
11:00 am	70	44

9. The graph given below shows the positions of a body at different times. Calculate the speed of the body as it moves from

(i) A to B

(ii) B to C and

(iii) C to D.

MATTER IN OUR SURROUNDINGS

1. Which one of the following sets of phenomena would increase on raising the temperature?
(a) Diffusion, evaporation, compression of gases   (b) Evaporation, compression of gases, solubility
(c) Evaporation, diffusion, expansion of gases   (d) Evaporation, solubility, diffusion, compression of gases

2. Seema visited a Natural Gas Compressing Unit and found that the gas can be liquefied under specific conditions of temperature and pressure. While sharing her experience with friends she got confused. Help her to identify the correct set of conditions
(a) Low temperature, low pressure   (b) High temperature, low pressure
(c) Low temperature, high pressure   (d) High temperature, high pressure

3. The property to flow is unique to fluids. Which one of the following statements is correct?
(a) Only gases behave like fluids   (b) Gases and solids behave like fluids
(c) Gases and liquids behave like fluids   (d) Only liquids are fluids

4. During summer, water kept in an earthen pot becomes cool because of the phenomenon of
(a) diffusion   (b) transpiration   (c) osmosis   (d) evaporation

5. A few substances are arranged in the increasing order of 'forces of attraction' between their particles. Which one of the following represents a correct arrangement?
(a) Water, air, wind   (b) Air, sugar, oil   (c) Oxygen, water, sugar   (d) Salt, juice, air

6. On converting 25°C, 38°C and 66°C to kelvin scale, the correct sequence of temperature will be
(a) 298 K, 311 K and 339 K   (b) 298 K, 300 K and 338 K   (c) 273 K, 278 K and 543 K   (d) 298 K, 310 K and 338 K

7. Choose the correct statement of the following
(a) conversion of solid into vapours without passing through the liquid state is called sublimation.
(b) conversion of vapours into solid without passing through the liquid state is called vapourisation..
(c) conversion of vapours into solid without passing through the liquid state is called freezing.
(d) conversion of solid into liquid is called sublimation.

8. The boiling points of diethyl ether, acetone and n-butyl alcohol are 35°C, 56°C and 118°C respectively. Which one of the following correctly represents their boiling points in kelvin scale?
(a) 306 K, 329 K, 391 K   (b) 308 K, 329 K, 392 K   (c) 308 K, 329 K, 391 K   (d) 329 K, 392 K, 308 K

9. Which condition out of the following will increase the evaporation of water?
(a) Increase in temperature of water   (b) Decrease in temperature of water
(c) Less exposed surface area of water   (d) Adding common salt to water

10. In which of the following conditions, the distance between the molecules of hydrogen gas would increase?
(i) Increasing pressure on hydrogen contained in a closed container
(ii) Some hydrogen gas leaking out of the container
(iii) Increasing the volume of the container of hydrogen gas
(iv) Adding more hydrogen gas to the container without increasing the volume of the container
(a) (i) and (iii)   (b) (i) and (iv)   (c) (ii) and (iii)   (d) (ii) and (iv)

Short Answer Questions

11. A sample of water under study was found to boil at 102°C at normal temperature and pressure. Is the water pure? Will this water freeze at 0°C? Comment.

12. A student heats a beaker containing ice and water. He measures the temperature of the content of the beaker as a function of time. Which of the following (Fig. 1.1) would correctly represent the result? Justify your choice.
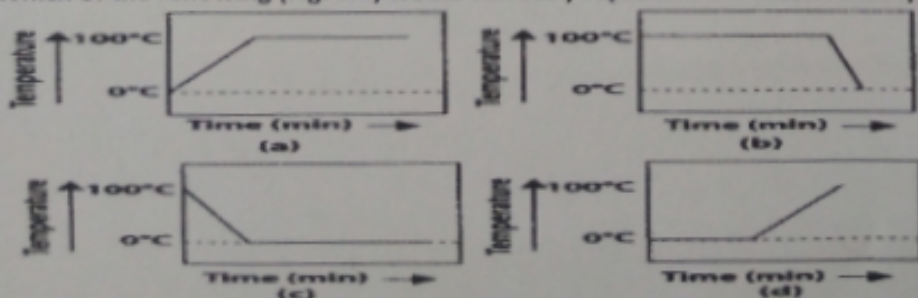

Fig. 1.1

13. Fill in the blanks:
(a) Evaporation of a liquid at room temperature leads to a ———— effect.

(b) At room temperature the forces of attraction between the particles of solid substances are————than those which exist in the gaseous state.

(c) The arrangement of particles is less ordered in the ———— state. However, there is no order in the ———— state.

(d) ———— is the change of solid state directly to vapour state without going through the ————state.

(e) The phenomenon of change of a liquid into the gaseous state at any temperature below its boiling point is called————.

14. Match the physical quantities given in column A to their S I units given in column B :

(A)	(B)
(a) Pressure	(i) cubic metre
(b) Temperature	(ii) kilogram
(c) Density	(iii) pascal
(d) Mass	(iv) kelvin
(e) Volume	(v) kilogram per cubic metre

15. The non S I and S I units of some physical quantities are given in column A and column B respectively. Match the units belonging to the same physical quantity:

(A)	(B)
(a) degree Celsius	(i) kilogram
(b) centimeter	(ii) pascal
(c) gram per centimetre cube	(iii) metre
(d) bar	(iv) kelvin
(e) milligram	(v) kilogram per metre cube

16. Water as ice has a cooling effect, whereas water as steam may cause severe burns. Explain these observations.

17. Alka was making tea in a kettle. Suddenly she felt intense heat from the puff of steam gushing out of the spout of the kettle. She wondered whether the temperature of the steam was higher than that of the water boiling in the kettle. Comment.

18. A glass tumbler containing hot water is kept in the freezer compartment of a refrigerator (temperature < 0°C). If you could measure the temperature of the content of the tumbler, which of the following graphs fig1.2 would correctly represent the change in its temperature as a function of time.
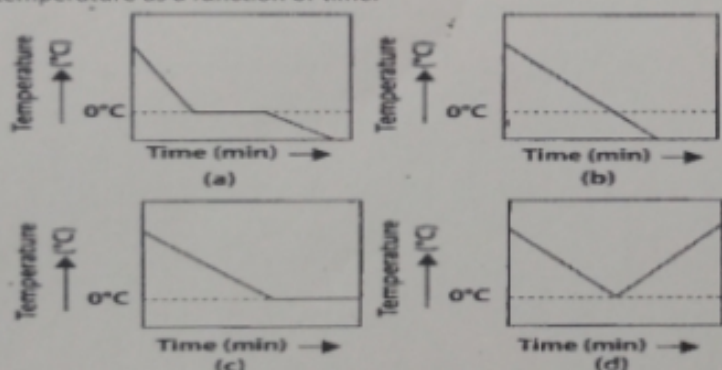

Fig. 1.2

19. Look at Fig. 1.3 and suggest in which of the vessels A,B, C or D the rate of evaporation will be the highest? Explain.
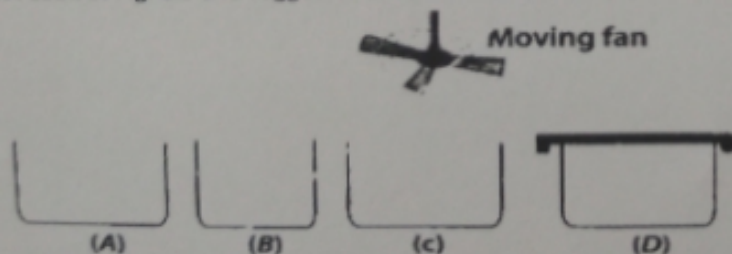

Fig. 1.3

20. Why does the temperature of a substance remain constant during its melting point or boiling point?

NUMBER SYSTEM

1. Prove that $\sqrt{5}-\sqrt{3}$ is not a rational number.

2. Arrange the following in descending order of magnitude: $\sqrt[3]{60}, \sqrt[4]{10}, \sqrt{6}$

3. Simplify the following:

   (i) $\left(4\sqrt{3}-2\sqrt{2}\right)\left(3\sqrt{2}+4\sqrt{3}\right)$

   (ii) $\left(2+\sqrt{3}\right)\left(3+\sqrt{5}\right)$

   (iii) $\left(\sqrt{3}+\sqrt{2}\right)^2$

4. Rationalize the denominator of the following:

   (i) $\dfrac{2}{\sqrt{3}-\sqrt{5}}$

   (ii) $\dfrac{\sqrt{3}+\sqrt{2}}{\sqrt{3}-\sqrt{2}}$

   (iii) $\dfrac{6}{\sqrt{5}+\sqrt{2}}$

   (iv) $\dfrac{1}{8+5\sqrt{2}}$

   (v) $\dfrac{3-2\sqrt{2}}{3+2\sqrt{2}}$

   (vi) $\dfrac{\sqrt{3}-1}{\sqrt{3}+1}$

   (vii) $\dfrac{4}{\sqrt{7}+\sqrt{3}}$

   (viii) $\dfrac{1}{5+3\sqrt{2}}$

6. If $a=6-\sqrt{35}$, find the value of $a^2+\dfrac{1}{a^2}$

7. If $x=3+\sqrt{8}$, find the value of (i) $x^2+\dfrac{1}{x^2}$ and (ii) $x^4+\dfrac{1}{x^4}$

10. If $x=\dfrac{\sqrt{2}+1}{\sqrt{2}-1}$ and $y=\dfrac{\sqrt{2}-1}{\sqrt{2}+1}$, find the value of x^2+y^2+xy.

11. If $x=\dfrac{\sqrt{3}+\sqrt{2}}{\sqrt{3}-\sqrt{2}}$ and $y=\dfrac{\sqrt{3}-\sqrt{2}}{\sqrt{3}+\sqrt{2}}$, find the value of x^2+y^2.

Q12.Find the degree of the polynomial

(i) $X^5 - X^4 + 3$ (ii) $2 - y^2 - y^3 + 2y^8$

Q13.classify the following as linear, quadratic and cubic polynomials

(i) $X^2 + x$ (ii) $x - x^3$ (iii) $y + y^2 + 4$

(iv)3t (vi) t^2

Q14.Check whether 2 and 0 are zeroes of the polynomial $X^2 - 2x$

Q15.Find the remainder when $X^3 + 3x^2 + 3x + 1$ is divided by x+1.

NOTE: prepare at least one mathematical model for MDP(Multi Dimensional project)

SUBJECT-SOCIAL SCIENCE   CLASS-IX A/B

A. **ANSWER THE FOLLOWING QUESTIONS.**
   HISTORY

   1.What were the social and political reason of French revolution?
   2.Who was Refers? Why is his reign referres as the reign of terror?
   3.How was the French society organised before the out break of French revolution?
   4.Writ the function of France constitution of 1791.
   5.Outline the political map of France for locating the following places- Bodeaux, Nantes,Paris,Marseilles

   GEOGRAPHY
   1.Write the size and extent of India?
   2.Explain why 82 degree 30'E chosen as standard meridian of India.
   3.What do you know about the India and its neighbours?
   4.Locate the following in the India map-tropic of cancer, standard meridian, India states with capital?

   Civics
   1.Why is democracy considered as the best form of government? Mention any 5 points?
   2.How democracy improves the quality of decision making?
   3.Explain any three difficulties faced by the people in non democratic country?
   4.How the president of Zimbabwe change the constitution of its country?

simple Padharia.
Sign of the Subject -Teacher :

KENDRIYA VIDYALAYA SUNDARGARH

HOLIDAY HOME WORK

Class- IX

Subject- Artificial Intelligence

Q.1 When people from different _____ backgrounds communicate the chances of wrong interpretation of messages are higher.

(a) Educational

(b) Cultural

(c) Emotional

(d) Psychological

Q.2 The communication process can be affected negatively by a number of barriers. Which of the following is / are barrier(s)?

(a) Cultural difference

(b) Technology

(c) Language Accent

(d) Calligraphy

Q.3 _____ is the sharing of information between two or more individuals or within a group to reach a common understanding.

(a) Cooperation

(b) Communication

(c) Translation

(d) Coordination

Q.4 What is communication?

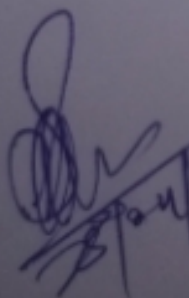Q.5 What is the significance of communication?

Q.6 What are the types of communication? Explain.

Q.7 What are the elements of communication? Explain.

Q.8 What are factors affecting communication?

Q.9 What is effective communication?

Q.10 What are the 7Cs of communication? Explain.