

C.B.S.E. PUBLIC SCHOOL

Affiliation No.- 330676

SUMMER VACATION HOME WORK

Class- 10th

English

1. You have recently seen a movie which you find quite interesting and instructive. Write a review of it.

Clues

- Title, description, cast
- Content
- Acting, direction, editing, music, choreography etc.
- Final opinion

2. Write a story on the theme "Virtuous are rewarded".

3. Write an article on the topic "Global Warming".

4. Revise all the taught lessons of literature.

➤ Make a Project on Resource and development

Describing, Definition, of resource their classification, resource planning, land utilization, types of soil, showing on map.

➤ History

1. Create an industrial map of India.
2. Suggest your views to save the Indian business from the glutting of goods of china.

➤ Biology

1. Make a well labeled diagram of "Human Nephron" on a cardboard.
2. Describe the functioning of "Haemodialysis" or surviving technology.
3. Discuss the functioning of a human heart.
4. What is reflex action? Explain with help of diagram.

➤ Physics

1. Draw the following diagrams and label them properly.
 - (a) Image formation by concave mirror for all possible position of object.
 - (b) Hypermetropia and myopia along with their correction.
2. Derive the following-
 - (a) Series combination of three resistors.
 - (b) Parallel combination of three resistors.
3. Solve all the numerical problem of chapter electricity with proper language with help of reference books.

Math

1. (a) Write the Euclid's division lemma. And find HCF of 3825 & 5005 using Euclid division algorithm.

(b) Prove that $\sqrt{5}$ is an irrational number.

2. (a) What are zero's of polynomial? Find the zeros of the quadratic polynomial $x^2+7x+10$, and verify the relationship between the zeros and the co-efficient.

(b) Find a quadratic polynomial each with the given numbers as the sum and product of its zeros respectively . (i) $0, \sqrt{5}$ (ii) $-\frac{1}{4}, \frac{1}{4}$ (iii) $\frac{1}{4}, -1$ (iv) $\sqrt{2}, \frac{1}{3}$

3 (a) Divide the polynomial $P(x)$, by the polynomials $g(x)$ and find the quotient and remainder.
 $P(x) = x^4 - 5x + 6$, $g(x) = 2 - x^2$

(b) (i) Obtain all other zeros of $3x^4 - 6x^3 - 2x^2 - 10x - 5$ if two of its zeros are $\sqrt{\frac{5}{3}}$ and $-\sqrt{\frac{5}{3}}$

(ii) On dividing $x^3 - 3x^2 + 2$ by 2 a polynomial $g(x)$, The quotient and remainder were $(x-2)$ and $-2x+4$, respectively. Find $g(x)$.

4. (a) Solve $\frac{5}{x-1} + \frac{1}{y-2} = 2$ $\frac{6}{x-1} - \frac{3}{y-2} = 1$

(b) Draw the graphs of the equations $5x - y = 5$ and $3x - y = 3$ determine the co-ordinates of the vertices.

(c) $\frac{x}{a} - \frac{y}{b} = 0$ $ax + by = a^2 + b^2$ solve it.

(d) Ritu can row downstream 20 km. in 2 hours and upstream 4 km in 2 hours. Find her speed of rowing in still water and the speed of current.

(e) 2 Women and 5 men can together finish an embroidery work in 4 days, while 3 women and 6 men can finish it in 3 days. Find the time taken by 1 woman alone to finish the work and also that taken by 1 man alone.