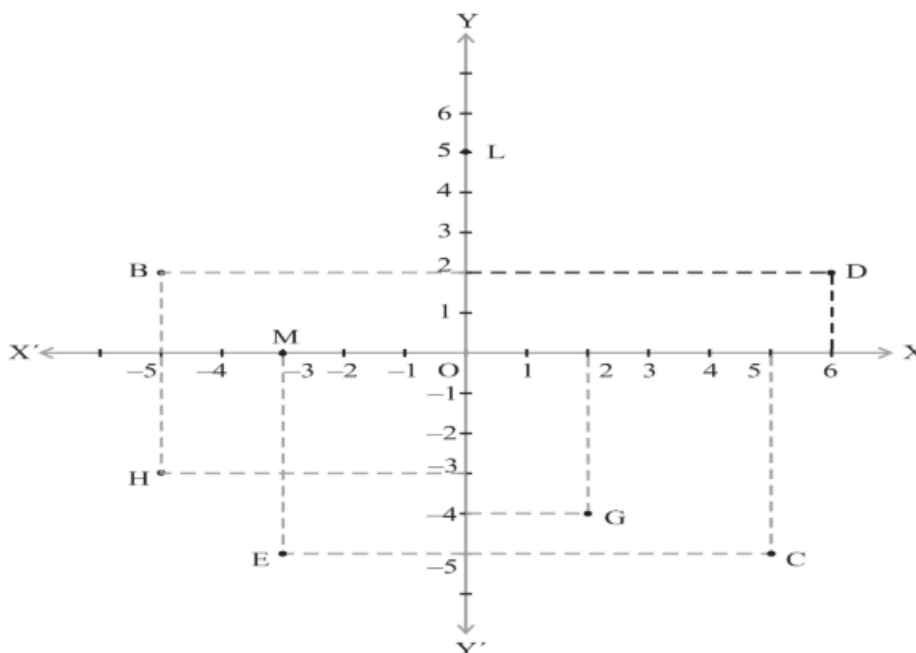


HOLIDAY HOMEWORK MATHS

- Revise all questions and examples of chapter 1,2 ,3,4, 5 and 6 then solve the following questions.
- Do the holiday homework in separate holiday homework notebook.

QUESTIONS:

- 1) The decimal representation of a rational number is
 - a) Always terminating
 - b) Either terminating or repeating
 - c) Either terminating or non repeating
 - d) Neither terminating nor repeating
- 2) Factorise : $2y^3+y^2-2y-1$.
- 3) Show that $0.2353535\ldots = 0.2\overline{35}$ can be expressed in the form $\frac{p}{q}$, where p and q are integers and $q \neq 0$
- 4) See fig. ,and write the following :
 - a) The coordinates of B.
 - b) The coordinates of C.
 - c) The points identified by the coordinates $(-3,-5)$.
 - d) The coordinates of the point M.
 - e) The abscissa of the point D.
 - f) The ordinates of the point H.



5) Verify that :

$$x^3+y^3+z^3-3xyz=\frac{1}{2}(x+y+z)[(x-y)^2+(y-z)^2+(z-x)^2]$$

6) The taxi fare in a city is as follows: For the first kilometer, the fare is ₹8 and for the subsequent distance it is ₹5 per km. Taking the distance covered as X km and total fare as ₹y , write linear equation for this information and draw its graph.

7) Represent $\sqrt{9.3}$ on the number line.

b) Simplify :

i. $(\sqrt{5} + \sqrt{2})^2$

ii. $(125)^{-1/3}$

8) Rationalise the denominator of $\frac{1}{(7+3\sqrt{2})}$.

9) Find the value of K, if $x=2$, $y=1$ is a solution of the equation $2x+3y=K$.

10) Write the four solution for $\pi x + y = 9$.

11) Zero of the zero polynomial is

a) 1

b) 0

c) Not defined

12) Any point on y-axis is of the form

a) (x,y)

b) (0,y)

c) (x,0)

d) (y,x)

13) Euclid stated that 'all right angle are equal to each other ' in the form of

a) A definition

b) An axiom

c) A postulate

d) A proof

14) The ordinate of every point on the x-axis is

a) 1

b) 0

c) -1

d) Any real number

15) Simplify :

$$2^{2/3} \cdot 2^{1/5}$$

16) Write the coefficient of x^2 in $2-x^2+x^3$.

17) Write the names of the points where the two axis intersect.

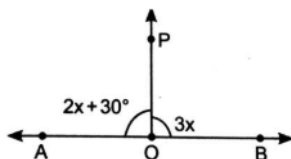
18) Write $y=2$ in two variable.

19) Find a zero of the polynomial $p(x)=2x+1$.

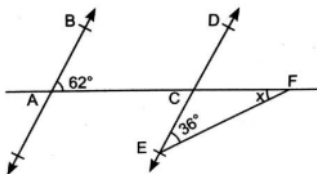
20) Prove that an equilateral triangle can be constructed on any given line segment

VERY SHORT ANSWER TYPE QUESTIONS

- Q1. If the complement of an angle is equal to the supplement of four times the angle, then find the measure of the angle.
 Q2. In a $\triangle ABC$, $\angle A + \angle B = 110^\circ$, $\angle C + \angle A = 135^\circ$. Find $\angle A$.
 Q3. In the given figure, what value of x will make AOB a line?



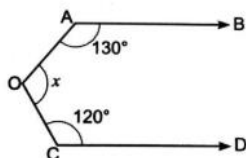
- Q4. In the given figure, $AB \parallel DE$, find x .



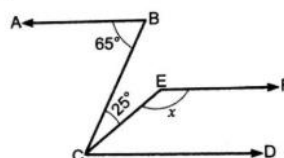
SHORT ANSWER TYPE QUESTIONS

- Q5. Determine the value of x in the given figure if $AB \parallel CD$ and EF

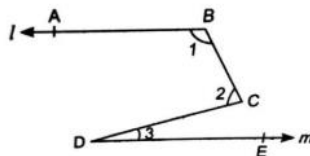
i.



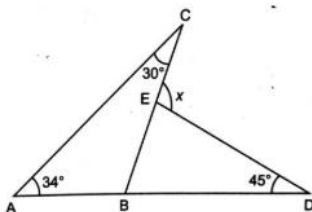
ii.



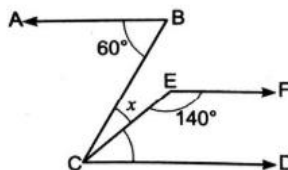
- Q6. In a triangle if $4\angle A = 3\angle B = 12\angle C$, find all the angles.
 Q7. The angles of a triangle are in the ratio 3:7:8. Find the angles of the triangle.
 Q8. In the given figure, $l \parallel m$. Show that $\angle 1 + \angle 2 - \angle 3 = 180^\circ$.



- Q9. In the given figure find the value of x .



- Q10. Find x if $AB \parallel CD \parallel EF$.



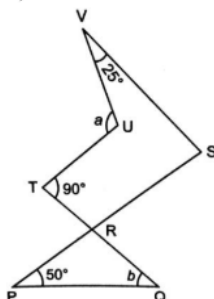
- Q11. If a transversal cuts two parallel straight lines and is perpendicular to one of them, show that it will be perpendicular to the other line also.

Q12. If two parallel lines are intersected by a transversal, show that the bisectors of any corresponding angles are parallel.

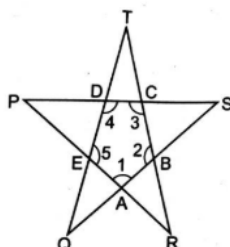
Q13. If two lines are intersected in such a way that the bisectors of a pair of corresponding angles are parallel, show that the given lines are parallel to each other.

Q14. Prove that the bisectors of a pair of alternate angles of two lines are parallel.

Q15. In the given figure, $TU \parallel SR$ and $TR \parallel SV$, then find $\angle a$ and $\angle b$.



Q16. In the given figure, prove that $LP + LQ + LR + LS + LT$ is equal to two right angles.

**ENGLISH**

- 1)Revise all the lesson that have been taught so far.
- 2)Learn any three new recipes and describe the process how you made them, on A4 sheet.
- 3)Talk to your grandfather / grandmother.Ask them to narrated some incident from their childhood.Describe the incident in your own words.Also,compare how your childhood was different from their.
- 4) write story on the following topics: -
 - A)Hardwork is the key to success
 - B) When I had to choose a gift for my mother
- 5) Compose a poem based on nature and create rhyme scheme also.
- 6) Write a story based on the following picture -



PHYSICS

Q1. A bus decreases its speed from 80 kmh^{-1} to 60 kmh^{-1} in 5s Find the acceleration of the bus.

Q2. A car travels at a speed of 40 km/hr for two hour and then at 60 km/hr for three hours. What is the average speed of the car during the entire journey?

Q3. What do you mean by average speed? What are its units?

Q4. Differentiate between distance and displacement?

Q5. Difference between weight and mass

Q6. Why do you fall in the forward direction when a moving bus brakes to a stop and fall backwards when it accelerates from rest?

Q7.. From a rifle of mass 4 kg, a bullet of mass 50 g is fired with an initial velocity of 35 m s^{-1} . Calculate the initial recoil velocity of the rifle.

Q8 How does the force of gravitation between two objects change when the distance between them is reduced to half?

Q9. What is the importance of universal law of gravitation?

Q10. State the universal law of gravitation.

CHEMISTRY

*A) Learn & write atomic number and mass number of first 20 element.

*B) Write chemical formula of the following: -

- 1) Calcium oxide
- 2) Aodium carbonate
- 3) Ammonium hydroxide
- 4) Potassium Sulphate
- 5) Aluminium chloride
- 6) Sodium nitrate
- 7) Magnesium iodide

*C) Learn symbol and valency of the first 20 element.

*D) Learn & Write:-

law of conservation of mass

Law of constant proportion

Isotopes, Isobars

1. **Why the RER appears rough?**
 2. *Why viruses are not supposed to be living?*
 3. *What is a nucleoid?*
 4. *Why dry raisins placed in water swell up?*
 5. *In which part of a plant are chloroplasts found?*
 6. *Where are genes located?*
 7. *What will happen if we keep a plant cell or animal cell in a*
 - i) *Hypotonic solution*
 - ii) *Hypertonic solution*
 - iii) *Isotonic solution.*
 8. *Explain the importance of osmosis for living beings?*
 9. *Give the historical development of cell theory.*
 10. *Who coined the term "cell" and how?*
 11. *Write the contribution of*
 - (a) *Robert Hooke,*
 - (b) *Leeuwenhoek*
 - (c) *Robert Brown*
 12. *Draw a large diagram of an animal cell as seen through an electron microscope. Label the parts that carry on the function of Respiration, secretion, protein synthesis, transport of material.*
 13. *Which substance is responsible for transfer of characters from one generation to another?*
- PROJECT WORK-Prepare a live demonstration model to compare plant cell and animal cell using common household items**

SOCIAL SCIENCE

- 1-Why most of the world's desert is located in the Western margin of continent of the sub tropical ?explain
 - 2-find out more about anyone of the revolutionary figure you have read about in the chapter French Revolution write a short biography of this person.
 - 3---Map Skills.--
 - A-Map of world -
 - #5 World Mountain Ranges
 - # 10 World lakes
 - #20 countries and it's capital
 - B-Map of India-
 - # 28 states & their capital
 - #10 Important Rivers
 - # 5 National parks of India
 - # Mountain Ranges
 - 4-Revise all chapters Ex. & Q&A .
- Note- Do complete HHW in F/B .

(HINDI)

निम्नलिखित कार्य को करने के लिए पेपर सीट का उपयोग कीजिए।

1. कबीर की साखियों से हमें क्या सीख मिलती है? अपने शब्दों में स्पष्ट कीजिए।
2. समास के सभी भेदों के पाँच-पाँच उदाहरण विग्रह सहित लिखिए।
3. निम्नलिखित विषयों पर लगभग 100 शब्दों में अनुच्छेद लिखिए -
(क) ग्लोबल वार्मिंग : मनुष्यता के लिए खतरा
4. एक लघु कथा लिखिए, जिसमें आपके सपनों का वर्णन हो जो आप करना चाहते हो।