

Holidays H.W

Class - X

Sub - Maths

Q. 1. Check whether 6^n can end with the digit 0 for any natural no. n.

Q. 2. Explain why $20 \times 8 \times 6$ is a composite no.

Q. 3. Find the H.C.F and L.C.M of 255 and 867

Q. 4. Find the H.C.F and L.C.M of $a^2 b c^3$ and $a b^2 c^3$

Q. 5. Prove that $3 + \sqrt{5}$ is an irrational no.

Q. 6. Solve:- $4\sqrt{25} + 3\sqrt{49} + \sqrt{3 \times 147}$

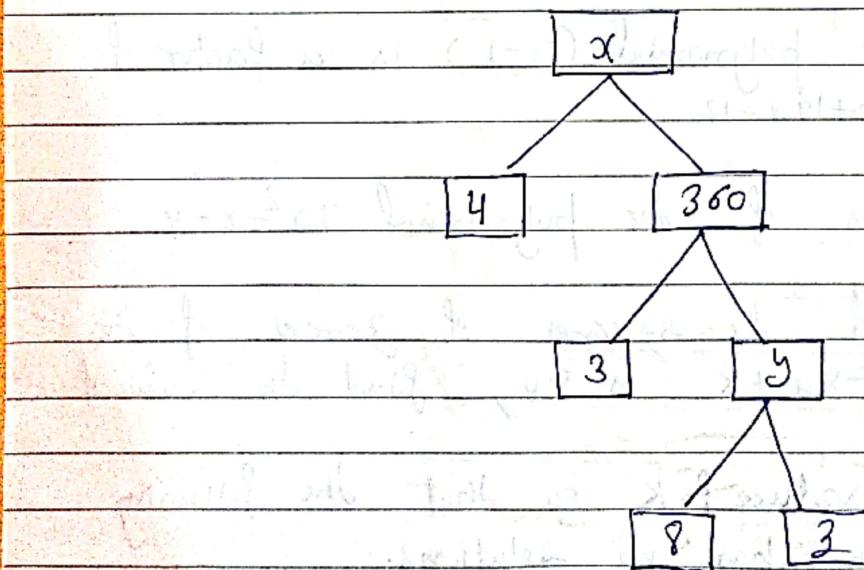
Q. 7. Write the following nos. in decimal form.

$$(i) \frac{77}{150} \quad (ii) \frac{35}{50} \quad (iii) \frac{365}{50}$$

Q. 8. Find the H.C.F and L.C.M of 8, 12, 15.

Q. 9. Two tankers contain 850 litres and 680 litres of petrol. Find the maximum capacity of a container which can measure the petrol of each tanker in exact number of times.

Q. 10. Complete the following factor tree and find the values of x, y and z



Q. 11. If α and β are zeroes of the polynomial $2x^2 - 5x + 3$ then find the value of

$$(i) \alpha + \beta \quad (ii) \alpha \cdot \beta \quad (iii) \frac{1}{\alpha} + \frac{1}{\beta}$$

Q.12. Find zeroes of the polynomial $x^2 - 7$

Q.13. If one zero of the polynomial is $2 + \sqrt{3}$, find other zero if polynomial is $x^2 - 4x + 1$

Q.14. Find a quadratic polynomial whose zeroes are 3 and $\frac{1}{3}$.

Q.15. Check whether $x-2$ is a factor of the polynomial $x^2 + 5x + 2$

Q.16. Find zeroes of the polynomial $3x^2 - x - 4$ and verify the relationship between zeroes and the coefficients.

Q.17. Draw the graph of the polynomial $y = x^2 + 2x - 3$

Q.18. If zeroes of the polynomial $x^2 + (a+1)x + b$ are 2 and -3, then find the values of a and b.

Q.19. If sum of the squares of zeroes of the polynomial $x^2 - px + k$ is 40, find the value of k.

Q.20. Find zeroes of the Polynomial $4x^2 - 8x + 4$

Q.21. Solve the following equations graphically

$$2x + y = 0$$

$$\text{and } 3x + 2y = -2$$

Q.22. Solve the following equations.

$$\frac{x}{2} + \frac{y}{3} = 7$$

$$\text{and } \frac{x}{4} + \frac{y}{3} = 6$$

Q. 23. Find the value of K so that the following equations has no solution.

$$\text{and } \begin{aligned} 3x - y &= 5 \\ 6x - 2y + K &= 0 \end{aligned}$$

Q. 24. Find the value of K so that the following system of equations has infinite solutions.

$$\text{and } \begin{aligned} 6x - 2y - 10 &= 0 \\ 12x - 4y + 2K &= 0 \end{aligned}$$

Q. 25. Find whether the following pair of linear equations is consistent or inconsistent.

$$\text{and } \begin{aligned} 3x + 2y &= 8 \\ 6x - 4y &= 9 \end{aligned}$$

Q. 26. How many solutions does the pair of equations $y = 0$ and $y = -5$ has?

Q. 27. Find the solution of $2x + 3y = 9$ and $3x + 4y = 5$ using substitution method.

Q. 28. Solve the following equations using elimination method

$$\text{and } \begin{aligned} 4x - 3y &= 8 \\ 6x - y - \frac{29}{3} &= 0 \end{aligned}$$

Q. 29. Solve:- $4x + \frac{6}{y} = 15$

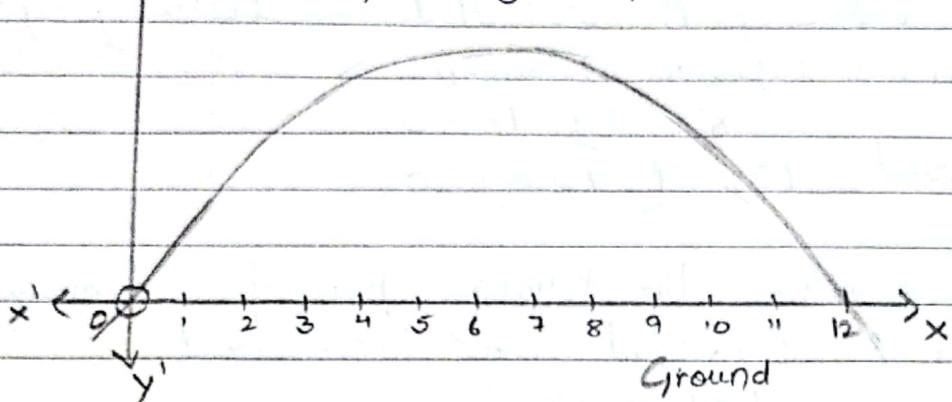
$$\text{and } 6x - \frac{8}{y} = 14$$

Q. 30. $\frac{x}{a} + \frac{y}{b} = a+b$

$$\text{and } \frac{x^2}{a^2} + \frac{y^2}{b^2} = 2$$

Case-Study 1

During an inter school competition, a shot put event was organised. The objective of this game is to throw a heavy ball (Known as a shot) as far as possible. The graph given below depicts the path covered by a shot put by a player.

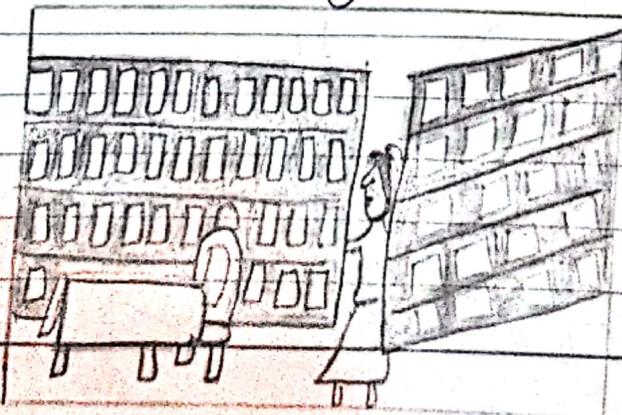


Based on the above information, answer the following questions →

- Name the shape of the path covered by the shot.
- What is the no. of zeroes of the polynomial representing the above graph? P
- Find the polynomial representing the above graph.

Case-Study 2

Two students A and B went to a library to return some books. The library has a fixed charge for the first two days and an additional charge for each day thereafter. Student A was issued a book for 10 days and charged Rs 94 whereas, Student B was issued a book for 8 days and was charged Rs. 78



Art-Integrated Project

* Physical and demographic aspects of Manipur.

* Activity 1. Show that two Polygons of the same no. of sides are similar if
(i) their corresponding angles are equal
(ii) their corresponding sides are in the same ratio.

* Activity 2.

A town B is located 36 km east and 15 km north of the town A - How would you find the distance from town A to town B without actually measuring it.

* Learn and write (2 to 20) tables (10 times)

← End →

Syllabus For Class X Session: 2023-24

Social Science

PERIODIC TEST-1

Ch-1 Resources and Development (Geography)

Ch-1 Power Sharing(PoliticalScience)

Ch-1 Development (Economics)

PERIODIC TEST-2

Ch-1 The Rise of Nationalism In Europe(History)

Ch-2 Federalism (Pol.Sci.)

Ch-2 Sectors of the Indian Economy(Economics)

HALF YEARLY EXAMINATION : (TERM-1)

Ch-1 Nationalism In Europe

Ch-2 Nationalism in India

Ch-3 The making of the Global World(following topics will be included in board exam)

Sub Topic -1

The pre modern World

Sub topic-2

19 th century- 1815-1914

Sub topic 3

The inter-war economy

Sub topic 4

Rebuilding of the world economy: the post war era.

Geography:

Ch-1 Resources and Development

Ch-2 Forest and Wildlife

Ch-3 Water Resources

Ch-4 Agriculture

Political Science:

Ch-1 Power Sharing

Ch-2 Federalism

Ch-4 Gender Religion and Cast

Economics

: Ch-1 Development

Ch-2 Sectors of the Indian Economy

Ch-3 Money and Credit

PERIODIC TEST-3

Ch-5 Mineral and Energy Resources

Ch-6 Political Parties

Ch-4 Globalization and the Indian Economy

Following topics will be included in board exam

Sub topics-

What is Globalization?

Factors that have enabled Globalization

Sub topics:

Production across the countries, Chinese toys in India and the World Trade organization. The struggle for A fair Globalization.

Remaining Chapters

Ch-4 The Age of Industrialisation(History to be assessed in periodic test only)

Ch-5 Print Culture (History)

Ch-6 Manufacturing Industries (Geography)

Ch-7 Life Lines of Indian Economy (Geography) Following topics will be included in board exam

Sub topics-

Roadways and Railways

Sub topics-

Waterways and Airway

Ch-7 Outcomes of Democracy (Pol.Science)

- **Map work will be done according to the Geography and History.**

Map Syllabus

- **Whole syllabus will be included in Pre Boards and Final Board Examinations.**

LIST OF MAP SYLLABUS CLASS X (2022-23)

A. HISTORY (Outline Political Map of India)

Chapter - 3 Nationalism in India – (1918 – 1930) for locating and labeling / Identification

1. Indian National Congress Sessions:

a. Calcutta (Sep. 1920) b. Nagpur (Dec. 1920) c. Madras (1927)

2. Important Centers of Indian National Movement a. Champaran (Bihar) - Movement of Indigo Planters b. Kheda (Gujarat) - Peasant Satyagraha c. Ahmedabad (Gujarat) - Cotton Mill Workers Satyagraha d. Amritsar (Punjab) - Jallianwala Bagh Incident e. Chauri Chaura (U.P.) - Calling off the Non-Cooperation Movement Dandi (Gujarat) - Civil Disobedience Movement

B. GEOGRAPHY (Outline Political Map of India)

Chapter 1: Resources and Development (Identification only)

a. Major soil Types

Chapter 3: Water Resources (Locating and Labeling)

Dams: a. Salal b. Bhakra Nangal c. Tehri d. Rana Pratap Sagar e. Sardar Sarovar f. Hirakud g. Nagarjuna Sagar h. Tungabhadra

Chapter 4: Agriculture (Identification only)

- a. Major areas of Rice and Wheat
- b. Largest / Major producer states of Sugarcane, Tea, Coffee, Rubber, Cotton and Jute

Chapter 5: Minerals and Energy Resources Minerals (Identification only)

- a. Iron Ore mines Mayurbhanj Durg Bailadila Bellary Kudremukh
- b. Coal Mines Raniganj Bokaro Talcher Neyveli
- c. Oil Fields Digboi Naharkatia Mumbai High Bassein Kalol Ankleshwar
- Power Plants (Locating and Labeling only)
- a. Thermal Namrup Singrauli Ramagundam
- b. Nuclear Narora Kakrapar Tarapur Kalpakkam

Chapter 6: Manufacturing Industries cotton textile industries: Mumbai, indore, surat, kanpur, coimbatore

Iron and Steel Plants-Durgapur, Bokaro, jamshedpur, Bhilai, Vijaynagar, salem eq (Locating and Labeling Only)

Software Technology Parks:

- a. Noida
- b. Gandhinagar
- c. Mumbai
- d. Pune
- e. Hyderabad
- f. Bengaluru
- g. Chennai
- h. h-Thiruvananthapuram

Chapter 7: Lifelines of National Economy

Major Ports: (Locating and Labeling)

- a. Kandla
- b. Mumbai
- c. Marmagao
- d. New Mangalore
- e. Kochi
- f. Tuticorin
- g. Chennai
- h. Visakhapatnam
- i. Paradip
- j. Haldia

International Airports: a. Amritsar (Raja Sansi - Sri Guru Ram Dass jee) b. Delhi (Indira Gandhi) c. Mumbai (Chhatrapati Shivaji)

Chennai (Meenambakkam) e. Kolkata (Netaji Subhash Chandra Bose) f. Hyderabad (Rajiv Gandhi)

CLASS-10 ENGLISH HOU DAY HOMEWORK

Note: the home work should be submitted in a handmade folder.

1. Prepare any 1 SDG out of 17 and Write a paragraph about it. Colour the logo as well.
2. Make a chart (A-4 size) about 10 poetic devices done so far along with at least 2 examples from the textbook. Present it in a tabular/ web chart form.
3. Maintain a personal diary and write your daily routine or visit to some place or any other activity you did in vacations.
4. Prepare UT 2 syllabus.

ART INTEGRATED ACTIVITY (MANIPUR)

Collect the information about topics given below and write an Analytical Paragraph about it.

- a) Tourist Footfall - National – International From (1950-2022)
- b) Occupation in Manipur (Ratio - Men /women) from (1950-2022)
- c) Literacy Rate of from 1950-2022 the state of Manipur
- d) Forests of Manipur, unique animals found 1950-2022)
- e) Endangered and Extinct Animals from (1950-2022)
- f) Different kinds of handicrafts and their export in % from (1950-2022)

कक्षा दसवीं
विषय हिंदी
ग्रीष्म अवकाश हेतु गृह कार्य (2023-24)

निर्देश:-कार्य को स्वच्छता से करें व भाषा की वर्तनी पर विशेष ध्यान दें।

1. संत कवि सूरदास के समकालीन किसी अन्य कवि के पदों का संकलन करते हुए सचित्र एक परियोजना कार्य तैयार कीजिए। (लगभग तीन-चार शीट में) प्रस्तुतीकरण आकर्षक और प्रभावशाली होना चाहिए।

अथवा

"सूरदास के पदों" की सबसे बड़ी विशेषता है, गोपियों की वाकपटुता, गोपियों ने अपनी वाकपटुता से जानी उद्धव को भी निरुत्तर अर्थात परास्त कर दिया। सूरदास की गाँपियों की विशेषताओं का सचित्र वर्णन कीजिए।

2. भारत में ऐसे कौन से महापुरुष हुए जिन्होंने सामाजिक बुराइयों का डटकर विरोध किया व उन्हें सफलता भी मिली। (किसी एक पर सचित्र लेख लिखें)

3. "मणिपुर की भौतिक विशेषताएं व संस्कृति" पर (लगभग 2,3 पृष्ठ में) एक सचित्र परियोजना कार्य तैयार कीजिए।

4. हिंदी में अनेक छायावादी कवि हुए हैं, किन्हीं दो कवियों की रचना को A4 साइज शीट पर सचित्र लिखें।

5. मणिपुर की लोक संस्कृति को दर्शाते हुए एक विज्ञापन बनाएं।

4 करवाए गए पाठ्यक्रम को याद करें।