



Session: 2026-2027

PTSC OLYMPIAD

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U.P. VITTVIHIN PRABANDAK FOUNDATION



PTSC OLYMPIAD

Hindi, English, Mathematics, Science, Reasoning, Social Science, GK & Current Affair

Class: 8

Sample Paper

Total Questions: 100 | Time: 100 Min

General Instructions (OMR Based Test)

1. This is an OMR based test, you will get additional 15 minutes to fill your details on the OMR sheet, before the start of the exam.

2. Write your **name, school, class, etc.** clearly on the **OMR sheet**.

3. The question paper comprises 10 sections:

Hindi (15 questions), **English** (15 questions), **Mathematics** (15 questions), **Science** (15 questions),

Reasoning (10 questions), **Social Science** (10), **General Knowledge** (10), **Current Affairs** (10),

a. All questions are compulsory. There is no negative marking. Use of calculator is not permitted.

b. This is a multiple choice-based question paper. Choose only one option for an answer.

c. Use only **HB pencil** or **Blue/Black ball point pen** to mark your answers.

d. Correct way of marking answer:

E.g., Q.1: Where do whales live?

A. Pond

B. River

C. Ocean

D. Glacier

As the correct answer is option C, you must darken the circle corresponding to option C on the OMR Sheet.

1.

A

B

D

4. Rough work should be done in the blank space provided in this booklet.

5. Return the OMR Sheet to your teacher. You can take the question paper booklet along with you.

6. Attempt all questions. Good luck for the test.

Name:

Roll No..... Contact No.....

Section A: (Hindi)

1. "प्रेम" का विलोम शब्द क्या है?
A. स्नेह. B. घृणा C. दया D. करुणा
2. "अंधकार" का पर्यायवाची शब्द कौन-सा है.
A. उजाला B. तम C. रोशनी D. दिन
3. "गाय दूध देती है।" — इस वाक्य में कर्ता कौन है.
A. गाय B. दूध C. देती D. है
4. "विद्या धन से श्रेष्ठ है।" — यह वाक्य किस प्रकार का है.
A. प्रश्नवाचक B. विधानवाचक C. नकारात्मक D. विस्मयवाचक
5. "लाल गुलाब खिला है।" — इसमें "लाल" कौन-सा शब्द भेद है.
A. संज्ञा B. सर्वनाम C. विशेषण D. क्रिया
6. "राम-लक्ष्मण" किस प्रकार का समास है.
A. तत्पुरुष B. द्वंद्व C. कर्मधारय D. बहुव्रीहि
7. "निष्काम" शब्द में कौन-सा उपसर्ग है.
A. न B. नि C. अ D. परा
8. "मिट्टी की मूरत" — इसमें कौन-सा अलंकार है.
A. रूपक B. उपमा C. अनुप्रास D. अतिशयोक्ति
9. "बालक पढ़ रहा था।" — यह वाक्य किस काल का है.
A. वर्तमान काल B. भूतकाल C. भविष्य काल D. आदेश काल
10. "कच्ची गोली मत समझना" — इस मुहावरे का अर्थ है.
A. बच्चा समझना B. कमजोर समझना C. नासमझ समझना D. चालाक समझना
11. "फूल खिलना" का अर्थ है.
A. हँसना B. दुखी होना C. खुलना D. प्रसन्न होना
12. "हृदय" का समानार्थी शब्द कौन-सा है.
A. मन B. चित्त C. हृदय D. अंतर
13. "बालक ने भोजन किया।" — इसमें "भोजन किया" क्या है.
A. संज्ञा B. विशेषण C. क्रिया D. अव्यय
14. "नीलकमल" में कौन-सा समास है.
A. तत्पुरुष B. कर्मधारय C. द्वंद्व D. बहुव्रीहि
15. "जो सत्य बोले" — इसका एक शब्द क्या होगा.
A. सत्यवादी B. सत्यप्रिय C. सत्यान्वेषी D. सच्चा

Section A: (English)

16. Choose the correct form of the verb:

He _____ to school every day.

- A. go B. goes C. going D. gone

17. Choose the correct passive voice:

They are cleaning the room.

- A. The room was cleaned. B. The room is cleaned.
C. The room is being cleaned. D. The room has been cleaned.

18. Fill in the blank with the correct article:

He is _____ honest man.

- A. a B. an C. the D. no article

Choose the correct preposition:

The cat is hiding _____ the table.

- A. on B. in C. under D. at

20. Identify the correct tense:

She had finished her work before I arrived.

- A. Present perfect B. Past perfect
C. Future perfect D. Simple past

21. Choose the correct meaning of the idiom "Once in a blue moon".

- A. Very often B. Never C. Rarely D. Always

22. Choose the correct proverb:

- A. All that glitters is not gold.
C. Gold glitters always.
B. All the glitters are gold.
D. Everything that shines is gold.

23. Choose the correct one-word substitution:

A person who writes poems —

- A. Author B. Poet C. Editor D. Lyricist

24. Choose the correct phrasal verb:

He called off the meeting.

- A. Started B. Postponed C. Cancelled D. Attended

25. Identify the type of sentence:

Please close the door.

- A. Declarative B. Interrogative C. Imperative D. Exclamatory

26. Choose the correct synonym of the word "Brave".

- A. Coward B. Fearful C. Courageous D. Lazy

27. Choose the correct antonym of "Victory".

- A. Success B. Triumph C. Failure D. Win

28. _____ mangoes grow in summer season.

- A. The B. A C. An D. No article

29. Change into active voice:

The song was sung by her.

- A. She sang the song.
C. She was singing the song.
B. The song sings her.
D. She sings the song.

30. Choose the correct spelling:

- A. Receive B. Recieve C. Recieve D. Receve

Section: B (Mathematics)

31. If $x = \frac{3+\sqrt{5}}{2}$, then find the value of $x^2 - 3x + 1$:

- A. 1 B. 2 C. 3 D. 0

32. The sides of a triangle are in ratio 3 : 4 : 5. If perimeter of the triangle is 36 cm, find the area of triangle.

- A. 54 cm^2 B. 50 cm^2 C. 44 cm^2 D. 48 cm^2

33. Square root of 1010025?

- A. 105 B. 1005 C. 2005 D. 1095

34. In a convex polygon with 10 sides, how many distinct triangles can be formed using its vertices?

- A. 110 B. 115 C. 120 D. 125

35. If $\frac{a}{b} = \frac{3}{5}$ where a and b are integers and a, b have no common factor other than 1,

then value of $\frac{a+b}{a+b} = ?$

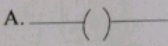
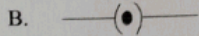
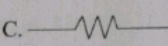
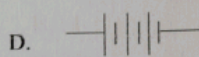
- A. $\frac{27}{8}$ B. $\frac{27}{3}$ C. $\frac{26}{8}$ D. $\frac{27}{4}$
36. Solve $2x^2 - 7x + 3 = 0$
 (i). 3 (ii). 4 (iii). $\frac{1}{2}$ (iv). $\frac{1}{4}$
 A. (i), (iii) B. (ii), (iv) C. (i), (ii) D. (i), (iv)
37. Cube root of 1157625 is:
 A. 105 B. 205 C. 195 D. 198
38. Rational number includes:
 A. Integers B. Whole Number
 C. Natural Number D. All of these
39. What is the value of $\frac{1}{3} + \frac{1}{4} + \frac{1}{5}$?
 A. $\frac{47}{60}$ B. $\frac{29}{60}$ C. $\frac{11}{20}$ D. $\frac{15}{20}$
40. If the product of two numbers is 144 and their difference is 12. What is the sum of the two numbers?
 A. 24 B. 28 C. 30 D. 32
41. The perimeter of an equilateral triangle is 45 cm. What is the area of the triangle?
 A. 72.5 cm^2 B. 60 cm^2 C. 64.95 cm^2 D. 85 cm^2
42. A circle is inscribed in a square, and the area of the square is 100 cm^2 , what is the radius of the circle?
 A. 5 cm B. 7 cm C. 10 cm D. 8 cm
43. A box contains 4 red balls, 6 blue and 5 green balls. If one ball is drawn at random, what is the probability that it is either red or green?
 A. $\frac{4}{15}$ B. $\frac{9}{15}$ C. $\frac{8}{15}$ D. $\frac{3}{15}$
44. What is the value of $\left(\frac{3}{4}\right)^3 + \left(\frac{4}{3}\right)^3$?
 A. $\frac{25}{27}$ B. $\frac{35}{27}$ C. $\frac{37}{27}$ D. $\frac{45}{27}$
45. If $x + \frac{1}{x} = 3$, what is the value of $x^2 + \frac{1}{x^2}$?
 A. 7 B. 9 C. 8 D. 5

Section: D (Science)

46. If a bicycle travels at a speed of 15km/h for 4 hrs, how much distance does it cover?
 A. 45 km B. 50 km C. 55 km D. 60 km
47. A car accelerates from rest to a speed of 25m/s in 10 seconds. What is its acceleration?
 A. 1.5 m/s^2 B. 2.5 m/s^2 C. 3.0 m/s^2 D. 4.0 m/s^2
48. The specific heat capacity of water is $4.18 \text{ J/g}^\circ\text{C}$. How much heat energy is required to raise the temperature of 200 grams of water by 5°C ?
 A. 4000 J B. 4180 J C. 4380 J D. 4580 J
49. A compound contains 2 atoms of hydrogen, 1 atom of carbon, and 3 atoms of oxygen. What is the molecular mass of the compound? (Atomic masses: H = 1, C = 12, O = 16)
 A. 52 B. 60 C. 62 D. 70
50. What is the primary function of red blood cells in the human body?
 A. Fight infections. B. Clot blood.
 C. Transport oxygen. D. Produce antibodies.
51. Which type of joint is found in the human shoulder?
 A. Hinge joint B. Ball-and-socket joint
 C. Pivot joint D. Fixed joint
52. Which element is essential for the production of thyroid hormones in human body?
 A. Calcium B. Iron C. Iodine D. Potassium
53. Which organ in the human body is responsible for filtering blood and producing urine?

A. Liver B. Lungs C. Heart D. Kidneys

Which of the following represents the art of growing fruits, vegetables and ornamental plants?

- A. Horticulture B. Agriculture C. Irrigation D. Cultivation
55. Which of the following micro-organisms helps in nitrogen fixation?
A. Prokaryotes B. Multicellular C. Eukaryotes D. None of these.
56. The accumulation of harmful chemicals in the body of living organisms is called:
A. Bio-concentration B. Sedimentation C. Contamination D. Filtration
57. Which of the following is a Zaid crop?
A. Sugarcane B. Wheat C. Bitter Guard D. Paddy
58. When light travels from one transport medium to another, a change in wavelength occurs. This is due to:
A. Change in density of the Medium. B. Change in colour of the Light. C. Change in frequency of the light. D. Change in refractive index of the Medium.
59. Which of the following can be used to explain the origin of universe?
A. Orion. B. Night Sky. C. Milky Way. D. The big bang theory.
60. Which of the following devices will act as a source of power in circuit?
A.  B.  C.  D. 

Section: B (Reasoning)

61. Which of the following Venn diagrams best represents the relationship amongst, "Sand, Water and Air"?



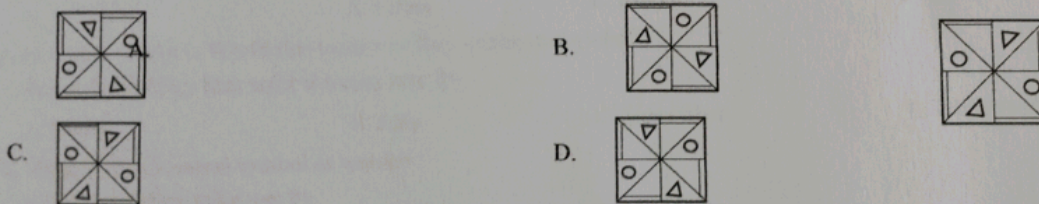
62. What is the angle formed by the hour hand, if it moves from 1pm to 5pm in a clock?

- A. 90° B. 120° C. 150° D. 100°

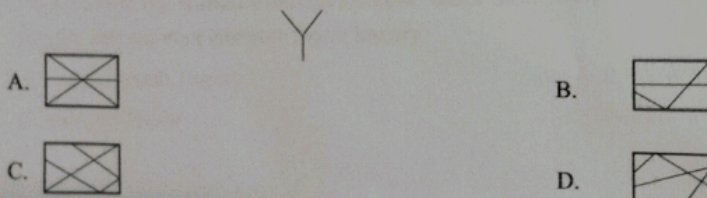
63. If '+' and '÷' and '2' and '4' are interchanged, then which of the following expressions will be true?

- A. $4 \div 2 + 3 = 5$ B. $6 + 2 \div 7 = 15$
C. $2 + 4 \div 3 = 5$ D. $2 + 3 \div 2 = 9$

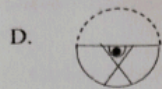
64. Select the correct water image of the given figure:



65. Select a figure from the options in which the given figure is embedded as one of its parts:



Select the figure from the options as to how the pattern would appear when reflected along the dotted line:



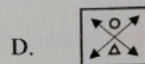
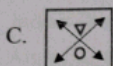
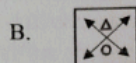
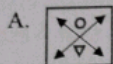
67. Which word will come on third place, if all of them are arranged as in a dictionary order?

- A. Chalk B. Chess C. Chair D. Chamber

68. If 'A' means '+', 'B' means '-', 'C' means '÷' and 'D' means '×', then find the value of 17A24B52C4D3.

- A. 0 B. 2 C. 3 D. 4

69. Choose the correct water image of the given figure.



70. Find the number of triangles formed in the given figure.

- A. 13
C. 15

- B. 14
D. 16



Section: E (General Knowledge)

71. What is the name of the line that divides the Earth into Eastern and Western Hemispheres?

पृथ्वी को पूर्वी और पश्चिमी गोलार्धों में बाँटने वाली रेखा का नाम क्या है?

- A. Prime Meridian B. Equator
C. Tropic of Cancer D. Tropic of Capricorn

72. Which vitamin is produced by the human body when exposed to sunlight?

सूर्य के प्रकाश में आने पर मानव शरीर कौन-सा विटामिन बनाता है?

- A. Vitamin A B. Vitamin B C. Vitamin C D. Vitamin D

73. Which mountain range separates Europe and Asia?

कौन-सी पर्वतमाला यूरोप और एशिया को अलग करती है?

- A. Himalayas B. Ural Mountains C. Andes D. Rockies

74. Which country is known for its policy of non-alignment?

कौन-सा देश गुटनिरपेक्ष नीति के लिए प्रसिद्ध है?

- A. India B. China C. Russia D. United States

75. In which month is World Environment Day celebrated globally?

विश्व पर्यावरण दिवस किस महीने में मनाया जाता है?

- A. March B. June C. September D. December

76. What is the chemical symbol of water?

जल का रासायनिक संकेत क्या है?

- A. WtO B. H₂O C. HO₂ D. O₂H

77. Who wrote the Indian national anthem "Jana Gana Mana"?

भारतीय राष्ट्रगान "जन गण मन" किसने लिखा?

- A. Rabindranath Tagore B. Bankim Chandra Chattopadhyay
C. Sarojini Naidu D. Harivansh Rai Bachchan

What is the capital city of Australia?

ऑस्ट्रेलिया की राजधानी क्या है?

A. Sydney

B. Melbourne

C. Canberra

D. Perth

79. Which gas do plants absorb from the atmosphere during photosynthesis?

प्रकाश संश्लेषण के दौरान पौधे वातावरण से कौन-सी गैस ग्रहण करते हैं?

A. Oxygen

B. Nitrogen

C. Carbon Dioxide

D. Hydrogen

80. What is the hardest natural substance found on Earth?

पृथ्वी पर पाया जाने वाला सबसे कठोर प्राकृतिक पदार्थ कौन-सा है?

A. Gold

B. Iron

C. Diamond

D. Quartz

Section: G (Current Affair)

81. India launched its largest-ever joint naval exercises with African nations in 2025.

2025 में भारत ने अफ्रीकी देशों के साथ अपनी सबसे बड़ी संयुक्त नौसैनिक अभ्यास की शुरुआत की।

यह अभ्यास किस क्षेत्र में केंद्रित था?

A. Indian Ocean & Africa

B. Pacific Ocean & Latin America

C. Arctic Circle

D. Southeast Asia

82. On 7 May 2025, India conducted a nationwide civil defence mock drill in how many districts?

7 मई 2025 को भारत ने कितने जिलों में राष्ट्रव्यापी नागरिक सुरक्षा मॉक ड्रिल आयोजित की?

A. 100

B. 200

C. 244

D. 300

83. The Constitution (130th Amendment) Bill 2025 removes ministers detained for how many consecutive days?

A. 15

B. 20

C. 30

D. 45

84. The Delhi Government's "NEEEV Programme" 2025 supports student entrepreneurs.

दिल्ली सरकार की "नीव कार्यक्रम" 2025 छात्र उद्यमियों को कितना न्यूनतम सहयोग देती है?

A. ₹10,000

B. ₹20,000

C. ₹30,000

D. ₹40,000

85. India approved reforms in the ship-building sector worth how much in 2025?

भारत ने 2025 में जहाज निर्माण क्षेत्र में कितनी राशि के सुधार स्वीकृत किए?

A. ₹50,000 crore

B. ₹94,000 crore

C. ₹1 lakh crore

D. ₹60,000 crore

86. India launched a scheme to reverse brain-drain under which mission?

भारत ने प्रतिभा पलायन रोकने हेतु किस मिशन के अंतर्गत योजना शुरू की?

A. Atmanirbhar Bharat

B. Digital India

C. Startup India

D. Make in India

87. The Indian Ports Act 2025 replaced the colonial-era Act of 1908. True or False?

भारतीय बंदरगाह अधिनियम 2025 ने 1908 के औपनिवेशिक अधिनियम को प्रतिस्थापित किया है। सही या गलत?

A. True

B. False

C. Partly True

D. Not Sure

88. India's GDP growth in April-June 2025 was approximately what percent?

अप्रैल-जून 2025 तिमाही में भारत की GDP वृद्धि लगभग कितनी प्रतिशत रही?

A. 6.0%

B. 7.8%

C. 5.5%

D. 8.5%

89. India and Japan collaborated for which lunar mission in 2025?

भारत और जापान ने 2025 में किस चंद्र मिशन पर सहयोग किया?

A. Chandrayaan-4

B. Chandrayaan-5

C. Mangalyaan-2

D. Gaganyaan-3

90. The "Zero Poverty Uttar Pradesh Campaign" 2025 aims to help how many poor families initially?

"शून्य गरीबी उत्तर प्रदेश अभियान" 2025 की प्रारंभिक चरण में कितने गरीब परिवारों को जोड़ने का लक्ष्य है?

A. 5 लाख

B. 13.5 लाख

C. 2 लाख

D. 20 लाख

Section: F (Social Science)

91. Who was the first Governor-General of India?

भारत का पहला गवर्नर-जनरल कौन था?

A. Lord Dalhousie

B. Lord Wellesley

C. Warren Hastings

D. Lord Curzon

the year 1857 started from which city:

1857 का विद्रोह किस शहर से प्रारंभ हुआ था?

- A. Delhi B. Lucknow C. Meerut D. Kanpur

93. Which Governor-General introduced the "Doctrine of Lapse"?

‘लैप्स का सिद्धांत’ (Doctrine of Lapse) किस गवर्नर-जनरल ने लागू किया था?

- A. Lord Wellesley B. Lord Dalhousie C. Lord Canning D. Lord Mountbatten

94. What is the main source of energy for the water cycle?

जल चक्र का प्रमुख ऊर्जा स्रोत क्या है?

- A. Moonlight B. Sunlight C. Wind D. Earth's core

95. Which soil is suitable for cotton cultivation?

कौन सी मिट्टी कपास की खेती के लिए उपयुक्त है?

- A. Alluvial soil B. Red soil C. Black soil D. Laterite soil

96. Which river is known as the "Sorrow of Bihar"?

‘बिहार का शोक’ किस नदी को कहा जाता है?

- A. Ganga B. Yamuna C. Kosi D. Brahmaputra

97. When did the Indian Constitution come into effect?

भारतीय संविधान कब प्रभावी हुआ?

- A. 15 August 1947 B. 26 January 1950 C. 2 October 1950 D. 14 November 1947

98. In which part of the Constitution are Fundamental Rights given?

मौलिक अधिकार संविधान के किस भाग में दिए गए हैं?

- A. Part I B. Part II C. Part III D. Part IV

99. Who is known as the Father of the Indian Constitution?

भारतीय संविधान के जनक किसे कहा जाता है?

- A. Mahatma Gandhi B. Dr. B. R. Ambedkar C. Dr. Rajendra Prasad D. Jawaharlal Nehru

100. Who elects the President of India?

भारत के राष्ट्रपति का चुनाव कौन करता है?

- A. Prime Minister B. Only Parliament C. Elected MPs and MLAs D. Judges of Supreme Court