# AMPLE PAPER TEST FOR BOARD EXAM 2024

#### SUBJECT: MATHEMATICS

#### CLASS : X

# MAX. MARKS : 80 **DURATION: 3 HRS**

# **General Instruction:**

- 1. This Question Paper has 5 Sections A-E.
- 2. Section A has 20 MCOs carrying 1 mark each.
- **3.** Section **B** has 5 questions carrying 02 marks each.
- 4. Section C has 6 questions carrying 03 marks each.
- 5. Section D has 4 questions carrying 05 marks each.
- 6. Section E has 3 case based integrated units of assessment (04 marks each) with sub-parts of the values of 1, 1 and 2 marks each respectively.
- 7. All Questions are compulsory. However, an internal choice in 2 Qs of 5 marks, 2 Qs of 3 marks and 2 Questions of 2 marks has been provided. An internal choice has been provided in the 2marks questions of Section E
- 8. Draw neat figures wherever required. Take  $\pi = 22/7$  wherever required if not stated.

# **SECTION – A** Questions 1 to 20 carry 1 mark each.

- 1. The pair of linear equations 2x + 3y = 5 and 4x + 6y = 10 is (a) inconsistent (b) consistent (c) dependent consistent (d) none of these
- 2. Points A(3, 1), B(5, 1), C(a, b) and D(4, 3) are vertices of a parallelogram ABCD. The values of a and b are respectively (a) a = 6, b = 3 (b) a = 2, b = 1 (c) a = 4, b = 2(d) None of these
- **3.** If  $\triangle ABC \sim \triangle EDF$  and  $\triangle ABC$  is not similar to  $\triangle DEF$ , then which of the following is not true? (a)  $BC \cdot EF = AC \cdot FD$  (b)  $AB \cdot EF = AC \cdot DE$ (c)  $BC \cdot DE = AB \cdot EF$ (d)  $BC \cdot DE = AB \cdot FD$
- 4. If sec A = 15/7 and  $A + B = 90^{\circ}$ , find the value of cosec B. (a) 8/7 (b) 12/7 (c) 7/15(d) 15/7
- 5. The LCM of two numbers is 14 times their HCF. The sum of LCM and HCF is 600. If one number is 280, then the other number is (a) 20 (b) 28 (c) 60 (d) 80
- 6. When 2120 is expressed as the product of its prime factors we get (a)  $2 \times 5^3 \times 53$  (b)  $2^3 \times 5 \times 53$  (c)  $5 \times 7^2 \times 31$  (d)  $5^2 \times 7 \times 33$
- 7. If p and q are the zeroes of the quadratic polynomial  $f(x) = 2x^2 7x + 3$ , find the value of p + q-pq is (a) 1 (b) 2 (c) 3 (d) None of these
- 8. ABCD is a trapezium with AD  $\parallel$  BC and AD = 4cm. If the diagonals AC and BD intersect each other at O such that AO/OC = DO/OB = 1/2, then BC = (a) 6cm (b) 7cm (c) 8cm (d) 9cm
- 9. If the angle between two radii of a circle is  $140^{\circ}$ , then the angle between the tangents at the ends of the radii is

(a) 90° (b) 50° (c)  $70^{\circ}$ (d) 40°

- **10.** The number of revolutions made by a circular wheel of radius 0.7 m in rolling a distance of 176 m is
  - (a) 22 (b) 24 (c) 75 (d) 40
- **11.** In  $\triangle ABC$ , right angled at B, AB = 5 cm and sin C = 1/2. Determine the length of side AC. (a) 10 cm (b) 15 cm (c) 20 cm (d) none of these
- **12.** In the  $\triangle$ ABC, D and E are points on side AB and AC respectively such that DE || BC. If AE = 2 cm, AD = 3 cm and BD = 4.5 cm, then CE equals



13. The median class of the following data is:

(a) 1 cm

Marks	0 – 10	10 - 20	20 - 30	30 - 40	40 - 50	50 - 60
No. of students	8	10	12	22	30	18
(a) 20 – 30	(b) 30 – 40		(c) 40 –	50	(d) 50 -	- 60

**14.** Two dice are thrown simultaneously. What is the probability of getting doublet?(a) 1/36(b) 1/6(c) 5/6(d) 11/36

<b>15.</b> If 4 tan $\theta = 3$	3, then the value of	$\frac{4\sin\theta - \cos\theta}{4\sin\theta + \cos\theta}$ is	
(a) 1/2	(b) 1/3	(c) 1/4	(d) 1/5

- **16.** The area of the square that can be inscribed in a circle of radius 8 cm is (a)  $256 \text{ cm}^2$  (b)  $128 \text{ cm}^2$  (c)  $64\sqrt{2} \text{ cm}^2$  (d)  $64 \text{ cm}^2$
- 17. The ratio of the total surface area to the lateral surface area of a cylinder with base radius 80 cm and height 20 cm is
  (a) 1:2
  (b) 2:1
  (c) 3:1
  (d) 5:1
- **18.** The mean and mode of a frequency distribution are 28 and 16 respectively. The median is (a) 22 (b) 23.5 (c) 24 (d) 24.5

**DIRECTION:** In the question number 19 and 20, a statement of **Assertion** (**A**) is followed by a statement of **Reason** (**R**).

Choose the correct option

(a) Both assertion (A) and reason (R) are true and reason (R) is the correct explanation of assertion (A) (A)

(b) Both assertion (A) and reason (R) are true and reason (R) is not the correct explanation of assertion (A)

- (c) Assertion (A) is true but reason (R) is false.
- (d) Assertion (A) is false but reason (R) is true.
- **19.** Assertion (A): The value of y is -6, for which the distance between the points P(2, -3) and Q(10, y) is 10.

**Reason (R):** Distance between two given points A (x<sub>1</sub>, y<sub>1</sub>) and B (x<sub>2</sub>, y<sub>2</sub>) is given by AB =  $\sqrt{(x_2 - x_1)^2 + (y_2 - y_1)^2}$ 

**20. Assertion (A):** The number 6<sup>n</sup> never end with digit 0 for any natural number n..
 **Reason (R):** The number 9<sup>n</sup> never end with digit 0 for any natural number n.

**<u>SECTION – B</u>** Questions 21 to 25 carry 2 marks each.

**21.** In the given figure, find the value of x in terms of a, b and c.



- **22.** XY and MN are the tangents drawn at the end points of the diameter DE of the circle with centre O. Prove that XY || MN.
- **23.** A rope by which a cow is tethered is increased from 16mto 23m. How much additional ground does it have now to graze?

OR

In the below figure, OACB is a quadrant of a circle with centre O and radius 3.5 cm. If OD = 2 cm, find the area of the (i) quadrant OACB, (ii) shaded region.



**24.** In figure, ABCD is a rectangle. Find the values of x and y.



**25.** Find A and B, if sin  $(A + 2B) = \sqrt{3}/2$  and cos (A + B) = 1/2.

0

If  $(1 + \cos A) (1 - \cos A) = 3/4$ , find the value of tan A.

## <u>SECTION – C</u> Questions 13 to 22 carry 3 marks each.

**26.** A part of monthly hostel charges in a college is fixed and the remaining depends on the number of days one has taken food in the mess. When a student 'A' takes food for 22 days, he has to pay Rs. 1380 as hostel charges; whereas a student 'B', who takes food for 28 days, pays Rs. 1680 as hostel charges. Find the fixed charges and the cost of food per day.

The ratio of income of two persons is 9:7 and the ratio of their expenditure is 4:3, if each of them manage to save Rs. 2000/month. Find their monthly incomes.

27. Prove that: 
$$\frac{\sin\theta - \cos\theta + 1}{\sin\theta + \cos\theta - 1} = \sec\theta + \tan\theta$$

- **28.** Prove that  $\sqrt{5}$  is and irrational number.
- **29.** Find the zeroes of the quadratic polynomial  $6x^2 7x 3$  and verify the relationship between the zeroes and the coefficients of the polynomial.
- **30.** Prove that the intercept of a tangent between two parallel tangents to a circle subtends a right angle at the center

#### OR

Prove that opposite sides of a quadrilateral circumscribing a circle subtend supplementary angles at the centre of the circle.

**31.** One card is drawn at random from a well-shuffled deck of 52 playing cards. Find the probability that the card drawn is (i) either a red card or a king, (ii) neither a red card nor a queen.

#### <u>SECTION – D</u> Questions 32 to 35 carry 5 marks each.

**32.** A vessel is in the form of an inverted cone. Its height is 8 cm and the radius of its top which is open, is 5 cm. It is filled with water upto the brim. When lead shots, each of which is a sphere of radius 0.5 cm are dropped into the vessel, one-fourth of water flows out. Find the number of lead shots dropped into the vessel.

#### OR

A copper wire of diameter 8 mm is evenly wrapped on a cylinder of length 24 cm and diameter 49 cm to cover the whole surface. Find (i) the length of the wire (ii) the volume of the wire.

- 33. Prove that if a line is drawn parallel to one side of a triangle intersecting the other two sides in distinct points, then the other two sides are divided in the same ratio. Using the above theorem prove that a line through the point of intersection of the diagonals and parallel to the base of the trapezium divides the non parallel sides in the same ratio.
- **34.** Two water taps together can fill a tank in  $9\frac{3}{8}$  hours. The tap of larger diameter takes 10 hours

less than the smaller one to fill the tank separately. Find the time in which each tap can separately fill the tank.

OR

A rectangular park is to be designed whose breadth is 3 m less than its length. Its area is to be 4 square metres more than the area of a park that has already been made in the shape of an isosceles triangle with its base as the breadth of the rectangular park and of altitude 12 m. Find its length and breadth.

**35.** If the median of the distribution given below is 28.5, find the values of x and y.

Class	0-10	10-20	20-30	30-40	40-50	50-60	Total
Frequency	5	x	20	15	у	5	60

# <u>SECTION – E(Case Study Based Questions)</u> Questions 35 to 37 carry 4 marks each.

**36.** Anita's mother start a new shoe shop. To display the shoes, she put 3 pairs of shoes in 1st row, 5 pairs in 2nd row, 7 pairs in 3rd row and so on.



On the basis of above information, answer the following questions.

- (i) If she puts a total of 120 pairs of shoes, then find the number of rows required. (2)
- (ii) What is the difference of pairs of shoes in 17th row and 10th row. (2)
- **37.** A 1.2 m tall girl spots a balloon moving with the wind in a horizontal line at a height of 88.2 m from the ground. The angle of elevation of the balloon from the eyes of the girl at any instant is  $60^{\circ}$ . After 30 seconds, the angle of elevation reduces to  $30^{\circ}$  (see the below figure).



Based on the above information, answer the following questions. (Take  $\sqrt{3}$  =1.732) (i) Find the distance travelled by the balloon during the interval. (2) (ii) Find the speed of the balloon. (2)

**38.** In the sport of cricket the Captain sets the field according to a plan. He instructs the players to take a position at a particular place. There are two reasons to set a cricket field—to take wickets and to stop runs being scored.

The following graph shows the position of players during a cricket match.

(i) Find the coordinate of the point on y-axis which are equidistant from the points representing the players at Cover P(2, -5) and Mid-wicket Q(-2, 9) [2]

(ii) Find the ratio in which x-axis divides the line segment joining the points Extra Cover S(3, -3) and Fine Leg (-2, 7). [2]



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#### **KENDRIYA VIDYALAYA SANGATHAN**

# PM SHRI KENDRIYA VIDYALAYA SEONI SESSION : 2024-25 सामाजिक विज्ञान/ SOCIAL SCIENCE (087) MODEL QUESTION PAPER Class-X

MM : 80

#### **General Instruction:**

1. The question paper comprises Six Sections – A, B, C, D, E and F. There are 37 questions in the Question paper. **All questions are compulsory**.

2. Section A – From questions 1 to 20 are MCQs of 1 mark each.

3. Section B – Question no. 21 to 24 are Very Short Answer Type Questions, carrying 2 marks each. Answer to each question should not exceed 40 words.

4. Section C contains Q.25to Q.29 are **Short Answer Type Questions**, carrying 3 marks each. Answer to each question should not exceed 60 words

5. Section D – Question no. 30 to 33 are **long answer type** questions, carrying 5 marks each. Answer to each question should not exceed 120 words.

6. Section-E - Questions no from 34 to 36 are **case based questions** with three sub questions and are of 4 mark each. Answer to each question should not exceed 100 words.

7. Section F – Question no. 37 is **map based**, carrying 5 marks with two parts, 37A from History (2 marks) and 37B from Geography (3 marks).

## सामान्य निर्देश:-

1. प्रश्न पत्र में छह खंड शामिल हैं - ए, बी, सी, डी, ई और एफ। प्रश्न पत्र में 37 प्रश्न हैं। सभी प्रश्न अनिवार्य हैं.

2. खंड ए - प्रश्न 1 से 20 तक प्रत्येक 1 अंक के बह् वैकल्पिक प्रश्न हैं।

3. खंड बी - प्रश्न संख्या 21 से 24 तक लघुउत्तरीय प्रश्न हैं, प्रत्येक 2 अंक का है। प्रत्येक प्रश्न का उत्तर 40 शब्दों से अधिक नहीं होना चाहिए।

4. खंड सी में Q.25 से Q.29 तक लघुउत्तरीय प्रश्न हैं, जिनमें से प्रत्येक 3अंक का है। प्रत्येक प्रश्न का उत्तर 60 शब्दों से अधिक नहीं होना चाहिए।

5. खंड डी - प्रश्न सं संख्या 30 से 33 तक दीर्घ उत्तरीय प्रश्न हैं, प्रत्येक 5 अंक का है। प्रत्येक प्रश्न का उत्तर 120 शब्दों से अधिक नहीं होना चाहिए।

6. खंड-ई - प्रश्न संख्या 34 से 36 तक केस आधारित प्रश्न हैं और प्रत्येक 4 अंक का है। प्रत्येक प्रश्न का उत्तर 100 शब्दों से अधिक नहीं होना चाहिए।

7. खंड एफ - प्रश्न संख्या 37 मानचित्र आधारित है, जिसमें दो भागों के साथ 5 अंक हैं, 37A इतिहास से (2 अंक) और 37B भूगोल से (3 अंक) है।

#### Section – A (20x1 = 20)

Q 1. Which of the following option best signifies image? निम्नलिखित में से कौन सा विकल्प ,छवि का सबसे अच्छा प्रतिनिधित्व करता है?

(a) War at Zweibrucken, German	(ए) ज़ेइब्रुकन,	जर्मन में युद्ध
(b) People celebrating Christmas	(बी) क्रिसमस	मनाते लोग
(d) None of above	(सी) लिबर्टी के	<sup>5</sup> पेड का रोपण
	(डी) उपरोक्त	में से कोई नही
<b>Q</b> 2. Oudh kisan sabha was setup and headed by	(0)/ 0 10100	
(a) Jawaharlal Nehru	(b) Mahatma Gandhi	i
(c) Baal Gangadhar tilak	(d) Lala Lajpat rai	
अवध किसान सभा की स्थापना और अध्यक्ष	ता किसने की:	
(ए) जवाहरलाल नेहरू	(बी) महात्मा गांधी	
(प) जनसरस्या महर	(वी) ताता तानपत गरा	
(सा) बाल गणावर सिलम		
<ul> <li>Q 3. Under the presidency of Jawaharlal Nehru, the demand of:</li> <li>(a) Abolition of salt</li> <li>(c) Boycott of Simon Commission</li> </ul>	The Lahore Congress session (b) Purna swaraj (d) Separate electora	n of 1929 formalised tes for the Dalits
जवाहरलाल नेहरू की अध्यक्षता में, 1929 वं	के लाहौर कांग्रेस सत्र ने निम्न	लिखित की मांग
को औपचारिक रूप दिया:	•	
(ए) नमक का उन्मलन	(बी) पर्ण स्वराज	
(स) साइमन कमीशन का बहिष्कार	(डी) दलितों के लिए अलग	निर्वाचन क्षेत्र
Q 4. Printing was developed in (a) India (b) Portugal	(c) China	(d) Germany
मुद्रण का विकास में हुआ था		
(ए) भारत (बी) पुर्तगाल	(सी) चीन	(डी) जर्मनी
<b>Q 5.</b> Direction: Read the statements and choose	the correct option.	

Assertion (A): Black soils are black in colour and are also known as regur soils.

**Reason** (R): Black soils are made up of lava flows

(a) Both A and R are true and R is the correct explanation of A.

- (b) Both A and R are true but R is not the correct explanation of A.
- (c) A is true but R is false.
- (d) A is false but R is true

निर्देश: कथनों को पढ़ें और सही विकल्प चुनें। दावा (ए):काली मिट्टी का रंग काला होता है और इसे रेगुर मिट्टी के रूप मे भी जाना जाता है। कारण (आर): काली मिट्टी लावा प्रवाह से बनी होती है (ए) यदि दावा और कारण दोनों सत्य हैं, और कारण दावे की सही व्याख्या है। (बी) यदि दावा और कारण दोनों सत्य हैं, लेकिन कारण, दावे की सही व्याख्या नहीं है। (सी) यदि दावा सत्य है, लेकिन कारण गलत है (डी) दावा और कारण दोनों गलत हैं							
<b>Q 6.</b> I	n which year, The Indian (a) 1970	wildlife act was implemen (b) 1971	nted ? (c) 1972	(d) 1974			
भार	रतीय वन्यजीव अधिनियम (ए) 1970	ा किस वर्ष लागू किया ग (बी) 1971	या था ? (सी) 1972	(डी) 1974			
<b>Q 7.</b> F	Rice requires high humidit (a) above 100cm	y with <u> </u>	(c) above 75cm	(d) above 60cm			
	चावल को सेमी वर्षा (ए) 100 सेमी से ऊपर (सी) 75 सेमी से ऊपर	के साथ उच्च आर्द्रता की (बी) 100 सेमी (डी) 60 सेमी	ो आवश्यकता होती है। से नीचे से ऊपर				
Q 8. V	Which two languages amo (a) French and English (c) Russian and Dutch	ng the following are prom	ninently spoken by Belg (b) Dutch and French (d) Russian and French	gium Nationals?			
निम	नलिखित में से कौन सी	दो भाषाएँ बेल्जियम के ब	नागरिकों दवारा प्रमखता	र से बोली जाती हैं?			

(ए) फ्रेंच और अंग्रेजी	(बी) डच और फ्रेंच
(सी) रूसी और डच	(डी) रूसी और फ्रेंच

 ${\bf Q}$  9. Match Forms of Power Sharing with Form of Government and select the correct  $% {\bf Q}$  answer , using the code, given below in the lists  $\,:\,$ 

सत्ता के साझेदारी के रूपों का ,सरकार के विभिन्न स्वरुप से मिलान करे तथा सही विकल चुने .

Forms of Power Sharing	Form of Government
सत्ता साझेदारी के रूप	सरकार के स्वरुप
1.Power shared among different organs of	A.Community government
government	साम्दायिक सरकार
सरकार के विभिन्न अंगो के बीच शक्ति साँझा	5
की गई	
2.Power shared among government at different	B.Sepration of power
levels	शक्ति का पृथक्करण

विधि	भेन्न स्तरों प	गर सरकार वे	त बीच सत्व	ग माद्मा				
की	गर्ड।							
3.P	3.Power shared by different social groups. विभिन्न सामाजिक समूहों द्वारा साझा की गई					C.Coalition Government गठबंधन सरकार		
शवि	न्ति							
4.P दो मॉब	4.Power shared by two or more political parties दो या दो से अधिक राजनीतिक दलों द्वारा				D.Federal Government संघीय सरकार			
Option	/विकल्प:							
	a	1 D	2 A	3 B	4 C		1	
	b	B	C	D	A			
	c d	B C	D D	A	C A			
Q 10.	The coming (a) India	together Fed (b) Spa	leration is _	(c) USA			(d) Australia	
एक (र	र साथ आने र ए) भारत	वाला महासंध (बी)	य स्पेन	है। (सी) यूप	सए	(3	डी) ऑस्ट्रेलिया	
Q 11.	What is leadi (a) Large sc (c) Occupat	ng to the bro ale urbanisa ional mobili	eakdown of tion ty	caste hie (b (	erarchy ) Grow d) All (	? with of lite of these	eracy and education	
जा	ति पदानुक्रम (ए) बड़े (सी) व्य	ं के टूटने क पैमाने पर ध गवसायिक ग	ग कारण क शहरीकरण ।तिशीलता	या है?	5) 5)	बी) साक्ष डी) ये स	ारता और शिक्षा का विकास 1भी	

**Q 12.** "A woman or man who believes in equal rights and opportunities for men and women." Select the correct option for the definition.

(a) Women's movement (b) Female Agitation (c) Feminist (d) None of these

"एक महिला या पुरुष जो पुरुषों और महिलाओं के लिए समान अधिकारों और अवसरों में विश्वास करता है।" परिभाषा के लिए सही विकल्प चुनें।

(ए) महिला आंदोलन (बी) महिला प्रदर्शन (सी) नारीवादी (डी) इनमें से कोई नहीं

Q 13. A party that secures at least six percent of the total votes in an election to the legislative assembly of the state and wins at least \_\_\_\_\_\_ is recognised as a state party.
(a) two seats
(b) three seats
(c) one seat
(d)five seats

एक पार्टी जो राज्य की विधान सभा के चुनाव में कुल वोटों का कम से कम छह प्रतिशत वोट हासिल करती है और कम से कम \_\_\_\_\_ जीतती है, उसे राज्य पार्टी के रूप में मान्यता दी जाती है।

(ए) दो सीटें	(बी) तीन सीटें	(सी) एक सीट	(डी) पांच सीटें	÷			
Q 14. We can judge democra (a) people	acy by its: (b) Outcomes	(c) political	parties	(d) None of these			
हम लोकतंत्र का मूल्यांकन (ए) लोग (बी	इसके आधार पर क ) परिणाम (सं	र सकते हैं ो) राजनीतिक दल	(डी) इनमें से	। कोई नहीं			
<b>Q 15.</b> The successful democ (a) right to vote	racy needs: (b) freedom	(c) periodic elec	ctions (	d) all of these			
सफल लोकतंत्र की आवश्य (ए) वोट देने का अधिकार	गकता है: (बी) स्वतंत्रता	(सी) आवधिक	चुनाव (डी) रे	रे सभी			
<ul> <li>Q 16. DIRECTION: Mark the option which is most suitable:</li> <li>Assertion: In India, over the forty years between 1973-74 and 2013-14, while production in all the three sectors has increased, it has increased the most in the tertiary sector.</li> <li>Reason: Tertiary sector is the only organized sector in the economy so the government spends a lot of money for creating jobs in tertiary sector</li> <li>(a) If both assertion and reasons are true, and reason is the correct explanation of assertion.</li> <li>(b) If both assertion and reasons are true, but reasons are not the correct explanation of assertion.</li> <li>(c) If Assertion is true, but reason is false.</li> </ul>							
निर्देश: उस विकल्प को चिहिनत करें जो सबसे उपयुक्त हो: दावा: भारत में, 1973-74 और 2013-14 के बीच चालीस वर्षों में, जबकि सभी तीन क्षेत्रों में उत्पादन में वृद्धि हुई है, यह तृतीयक क्षेत्र में सबसे अधिक वृद्धि हुई है। कारण: तृतीयक क्षेत्र अर्थव्यवस्था में एकमात्र संगठित क्षेत्र है इसलिए सरकार तृतीयक क्षेत्र में नौकरियां पैदा करने के लिए बहुत पैसा खर्च करती है (ए) यदि दावा और कारण दोनों सत्य हैं, और कारण दावे की सही व्याख्या है। (बी) यदि दावा और कारण दोनों सत्य हैं, लेकिन कारण, दावे की सही व्याख्या नहीं है। (सी) यदि दावा सत्य है, लेकिन कारण गलत है (डी) दावा और कारण दोनों गलत हैं							
Q 17. Which among the foll (a) Bank (b) Money निम्नलिखित में से कौन स (ए) बैंक (बी) साहक	owing options will l lender (c) ग विकल्प ग्रामीण ध गर (सी) सह	be the cheapest source Cooperative society सेत्रों में ऋण का सबर कारी समिति (ई	e of credit in ru (d) Finance ते सस्ता स्रोत ो) वित्त कंपनी	ıral areas? e company होगा? ा			

**Q 18.** Which among the following issues currency notes on behalf of the central government?

<ul><li>(a) State bank of India</li><li>(c) Commercial bank of India</li></ul>	<ul><li>(b) Reverse bank of India</li><li>(d) Union bank of India</li></ul>
निम्नलिखित में से कौन केंद्र सरकार की :	ओर से करेंसी नोट जारी करता है?
(ए) भारतीय स्टेट बैंक	(बी) रिजर्व बैंक ऑफ इंडिया
(सी) भारतीय वाणिज्यिक बैंक	(डी) यूनियन बैंक ऑफ इंडिया
<b>Q 19.</b> Globalisation has led to improvemen (a) of all the people (c) of workers in the developing co	t in living conditions: (b) of people in the developed countries untries (d) none of the these
वैश्वीकरण के कारण जीवन स्थितियों में	सुधार हुआ है:
(ए) सभी लोगों का	(बी) विकसित देशों के लोगों का
(सी) विकासशील देशों में श्रमिकों की (	डी) इनमें से कोई नहीं
Q 20. which is the following is an example (a)Tax on export (c)Tax on goods in special economic z	e of Trade Barrier ? (b) Tax on import one (d) Restriction on foreign investment by MNC
इनमे से कौन सा व्यापार बाधा का एव	त्र उदाहरण हैं :
(ए) निर्यात पर कर	(बी) आयात पर कर
(सी)विशेष आर्थिक क्षेत्र में माल पर	कर लगाकर
(डी) बह राष्ट्रीय कम्पनी द्वारा निवेश	ा पर प्रतिबंध

#### **Section** - B (4x2 = 8)

**Q 21.** Explain the three types of movement or flows identified by the international economists in the nineteenth century?

उन्नीसवीं सदी में अंतर्राष्ट्रीय अर्थशास्त्रियों द्वारा पहचाने गए तीन प्रकार के प्रवाह की व्याख्या करें।

**Q 22.** Explain two technological reforms initiative taken by the government to ensure the increase in agricultural productions?

कृषि उत्पादन में वृद्धि सुनिश्चित करने के लिए सरकार द्वारा की गई दो तकनीकी सुधार पहलों की व्याख्या करें।

**Q 23.** Why is power sharing desirable? Explain two reason.

सत्ता की साझेदारी वांछनीय क्यों है? दो कारण स्पष्ट करें.

Q 24. Describe any three features of 'Unitary government'.

'एकात्मक सरकार' की किन्हीं तीन विशेषताओं का वर्णन करें।

**Q 25.** "The 'Print Revolution' has transformed the lives of people, changing their relationship to information and knowledge." Analyse the statement.

'प्रिंट क्रांति' ने लोगों के जीवन को बदल दिया है, सूचना और ज्ञान के साथ उनके रिश्ते को बदल दिया है।" कथन का विश्लेषण करें।

- Q 26. Describe any three factors affecting location of industry in a region. किसी क्षेत्र में उदयोग की स्थिति को प्रभावित करने वाले किन्हीं तीन कारकों का वर्णन करें।
- Q 27. Describe any three features of Federal state? संघीय राज्य की किन्हीं तीन विशेषताओं का वर्णन करें?
- Q 28. What is the criterion used by the UNDP for classifying other countries? अन्य देशों को वर्गीकृत करने के लिए यूएनडीपी द्वारा उपयोग किया जाने वाला मानदंड क्या है?
- Q 29. Explain the main advantage of organised sector in respect of employment.

रोजगार के संबंध में संगठित क्षेत्र का मुख्य लाभ बताइये।

#### Section - D (4x5 = 20)

Q 30. Briefly explain the process of unification of Italy. इटली के एकीकरण की प्रक्रिया का वर्णन करें ।

- Q 31. Give a brief account of the major Iron belts in India. भारत में प्रमुख लौह पेटियों का संक्षिप्त विवरण दीजिए।
- Q 32. Examine the main challenges before political parties. राजनीतिक दलों के समक्ष मुख्य चुनौतियों का परीक्षण करें।
- Q 33. Review any three merits and any two demerits of 'Formal sector of credit' in India. भारत में 'औपचारिक ऋण क्षेत्र' के किन्हीं तीन गुणों और किन्हीं दो अवगुणों की समीक्षा करें।

#### Section -E (3x4 = 12)

#### Q 34. Read the given passage and answer the given Question :

Mahatma Gandhi's thoughts on Satyagraha:

'It is said of "passive resistance" that it is the weapon of the weak, but the power which is the subject of this article can be used only by the strong. This power is not passive resistance; indeed, it calls for intense activity. The movement in South Africa was not passive but active ...'

'Satyagraha is not physical force. A satyagrahi does not inflict pain on the adversary; he does not seek his destruction ... In the use of satyagraha, there is no ill-will whatever.'

'Satyagraha is pure soul-force. Truth is the very substance of the soul. That is why this force is called satyagraha. The soul is informed with knowledge. In it burns the flame of love... Non-violence is the supreme dharma ...'

'It is certain that India cannot rival Britain or Europe in force of arms. The British worship the wargod and they can all of them become, as they are becoming, bearers of arms. The hundreds of millions in India can never carry arms. They have made the religion of non-violence their own ...'

(1) What type of movement Gandhiji organised in South Africa?	1
(2) Why is satyagraha considered as pure soul-force?	1
(3) How has Gandhiji described passive resistance?	2

# दिए गए गदयांस को पढ़े तथा प्रश्नों का उत्तर दें :

सत्याग्रह पर महातमा गांधी के विचार:

'निष्क्रिय प्रतिरोध' के बारे में कहा जाता है कि यह कमज़ोरों का हथियार है, लेकिन जो शक्ति इस लेख का विषय है उसका उपयोग केवल ताकतवर ही कर सकता है। यह शक्ति निष्क्रिय प्रतिरोध नहीं है; वास्तव में, इसके लिए गहन गतिविधि की आवश्यकता है। दक्षिण अफ़्रीका में आंदोलन निष्क्रिय नहीं बल्कि सक्रिय था...'

'सत्याग्रह शारीरिक बल नहीं है। एक सत्याग्रही शत्रु को पीड़ा नहीं पहुँचाता; वह अपना विनाश नहीं चाहता...सत्याग्रह के प्रयोग में, कोई भी दुर्भावना नहीं है।'

'सत्याग्रह शुद्ध आत्मबल है। सत्य ही आत्मा का मूल तत्व है। इसीलिए इस बल को सत्याग्रह कहा जाता है। आत्मा को ज्ञान से अवगत कराया जाता है। इसमें प्रेम की लौ जलती है... अहिंसा परम धर्म है...'

'यह निश्चित है कि भारत हथियारों के बल पर ब्रिटेन या यूरोप का मुकाबला नहीं कर सकता। अंग्रेज युद्ध-देवता की पूजा करते हैं और वे सभी हथियार धारक बन सकते हैं, जैसे वे बन रहे हैं। भारत में करोड़ों लोग कभी भी हथियार नहीं रख सकते। उन्होंने अहिंसा के धर्म को अपना धर्म बना लिया है...'

(1) गांधीजी ने दक्षिण अफ्रीका में किस प्रकार का आंदोलन चलाया?
(2)सत्याग्रह को शुद्ध आत्मबल क्यों माना जाता है?
(3) गांधीजी ने निष्क्रिय प्रतिरोध को किस प्रकार वर्णित किया है?

# Q 35. Read the given passage and answer the given Question:

Earth 3/4<sup>th</sup> surface is covered with water still there is water scarcity, though water is considered as renewable resource is availability is limited. A report by the NITI Aayog stated that around 2 lakh people die in India every year due to inadequate water supply. It is common perceptions that only dry states like Rajasthan face water problem but the myth is broken by the recent ground water crises in cities of Chennai and Delhi. Surprisingly lack of availability of water is also supplemented with quality

of availability of water which is major source of many water prone diseases in India. Effective measures have to be taken by both state and central government to ensure water security to its citizens and problem should be resolved in time bound manner.

1. Water everywhere, not a drop to drink? Comment

1

2

- 2. Give reasons why rainfall rich states also face water scarcity problems? 1
- 3. Write some government initiatives to solve the problem of water crises. 2

# दिए गए गद्यांस को पढ़े तथा प्रश्नों का उत्तर दें :

पृथ्वी की तीन-चौथाई सतह पानी से ढकी हुई है, फिर भी पानी की कमी है, हालाँकि पानी को नवीकरणीय संसाधन माना जाता है, लेकिन उपलब्धता सीमित है। नीति आयोग की एक रिपोर्ट में कहा गया है कि अपर्याप्त जल आपूर्ति के कारण भारत में हर साल लगभग 2 लाख लोगों की मौत हो जाती है। यह आम धारणा है कि केवल राजस्थान जैसे शुष्क राज्यों को ही पानी की समस्या का सामना करना पड़ता है, लेकिन चेन्नई और दिल्ली शहरों में हाल के भूजल संकट से यह मिथक टूट गया है। हैरानी की बात यह है कि पानी की उपलब्धता की कमी के साथ पानी की उपलब्धता की गुणवत्ता भी जुड़ी हुई है, जो भारत में पानी से होने वाली कई बीमारियों का प्रमुख स्रोत है। अपने नागरिकों को जल सुरक्षा सुनिश्चित करने के लिए राज्य और केंद्र सरकार दोनों को प्रभावी उपाय करने होंगे और समयबद्ध तरीके से समस्या का समाधान करना होगा।

 1. हर जगह पानी, पीने को एक बूंद भी नहीं? टिप्पणी करें ?
 1

 2. कारण बताइए कि वर्षा से समृद्ध राज्यों को भी पानी की कमी की समस्या का सामना क्यों करना पड़ता है?
 1

3. जल संकट की समस्या के समाधान के लिए कुछ सरकारी पहल लिखें।

#### Q 36. Read the given passage and answer the given Question :

For comparing countries, their income is considered to be one of the most important attributes. Countries with higher income are more developed than others with less income. This is based on the understanding that more income means more of all things that human beings need. Whatever people like, and should have, they will be able to get with greater income. So, greater income itself is considered to be one important goal. Now, what is the income of a country? Intuitively, the income of the country is the income of all the residents of the country.

However, for comparison between countries, total income is not such a useful measure. Since, countries have different populations, comparing total income will not tell us what an average person is likely to earn. Are people in one country better off than others in a different country? Hence, we compare the average income which is the total income of the country divided by its total population.

The average income is also called per capita income. In World Development Reports, brought out by the World Bank, this criterion is used in classifying countries.

Countries with per capita income of US\$ 12616 per annum and above in 2012, are called rich countries and those with per capita income of US\$ 1035 or less are called low-income countries. India comes in the category of low middle income countries because its per capita income in 2012 was just US\$1530 per annum. The rich countries, excluding countries of Middle East and certain other small countries, are generally called developed countries.

- Do you think that "Countries with higher income are more developed than others with less income?"
- 2. What is the criterion used by the world bank in classifying the countries? 1
- 3. Why are the middle-east countries excluded from the list of developed countries? 2

दिए गए गदयांस को पढ़े तथा प्रश्नों का उत्तर दें :

देशों की तुलना के लिए उनकी आय को सबसे महत्वपूर्ण विशेषताओं में से एक माना जाता है। अधिक आय वाले देश कम आय वाले अन्य देशों की तुलना में अधिक विकसित होते हैं। यह इस समझ पर आधारित है कि अधिक आय का मतलब उन सभी चीजों से अधिक है जिनकी मनुष्य को आवश्यकता है। जो कुछ लोगों को पसंद है, और होना चाहिए, वह उन्हें अधिक आय के साथ मिल सकेगा। इसलिए, अधिक आय अपने आप में एक महत्वपूर्ण लक्ष्य माना जाता है। अब, किसी देश की आय क्या है? सहज रूप से, देश की आय देश के सभी निवासियों की आय है। इससे हमें देश की कुल आय प्राप्त होती है।

हालाँकि, देशों के बीच तुलना के लिए, कुल आय इतना उपयोगी उपाय नहीं है। चूंकि, देशों की आबादी अलग-अलग है, कुल आय की तुलना करने से हमें यह नहीं पता चलेगा कि एक औसत व्यक्ति कितना कमा सकता है। क्या एक देश के लोग दूसरे देश के अन्य लोगों की तुलना में बेहतर स्थिति में हैं? इसलिए, हम औसत आय की तुलना करते हैं जो देश की कुल आय को उसकी कुल जनसंख्या से विभाजित करती है। औसत आय को प्रति व्यक्ति आय भी कहा जाता है। विश्व बैंक द्वारा प्रकाशित विश्व विकास रिपोर्ट में, इस मानदंड का उपयोग देशों को वर्गीकृत करने में किया जाता है। 2012 में जिन देशों की प्रति व्यक्ति आय 12616 अमेरिकी डॉलर और उससे अधिक थी, उन्हें अमीर देश कहा जाता है और जिनकी प्रति व्यक्ति आय 1035 अमेरिकी डॉलर या उससे कम थी, उन्हें निम्न-आय वाले देश कहा जाता है। भारत निम्न मध्यम आय वाले देशों की श्रेणी में आता है क्योंकि 2012 में इसकी प्रति व्यक्ति आय मात्र 1530 अमेरिकी डॉलर प्रति वर्ष थी। मध्य पूर्व के देशों और कुछ अन्य छोटे देशों को छोड़कर, अमीर देशों को आम तौर पर विकसित देश कहा जाता है। 1. क्या आपको लगता है कि "अधिक आय वाले देश कम आय वाले अन्य देशों की तुलना में अधिक विकसित हैं?"

2.	विश्व बैंक द्वारा देशों को वर्गीकृत करने में किस मानदंड का उपयोग किया जाता है?	1
3.	मध्य-पूर्व के देशों को विकसित देशों की सूची से बाहर क्यों रखा गया है?	2

#### Section -F(2+3=5)

**Q 37.(A)** Two places A and B are marked on the outline political map of India, Identify these places with the help of following information and write correct names on the lines marked near them.

(a) The place where the Indian National congress held its session in December, 1920. 1

(b) Place where Mahatma Gandhi broke the salt law. 1 भारत के रूपरेखा राजनीतिक मानचित्र पर दो स्थान A और B अंकित हैं, दिए गए निम्नलिखित जानकारी की सहायता से इन स्थानों को पहचानकर उनके पास अंकित रेखाओं पर सही नाम लिखिए: (ए) वह स्थान जहां दिसंबर 1920 में भारतीय राष्ट्रीय कांग्रेस ने अपना सत्र आयोजित किया था। (बी) वह स्थान जहां महात्मा गांधी ने नमक कानून तोड़े थे।

**37.(B)** On the same map, show the following<br/>(a) Salal project1(b) Bhilai – Iron and Steel plant1(c) Rajiv Gandhi International Airport1

उसी मानचित्र पर निम्नलिखित दिखाएँ

(ए) सलाल परियोजना

(ब) भिलाई-लोहा और इस्पात संयंत्र

(स) राजीव गांधी अंतर्राष्ट्रीय हवाई अड्डा

Class and Section: .....

Q-37. (A) & 37 (B)



12 | 12 P a g e

# 2. English Language and Literature Code No. 184 CLASS - X

All questions are compulsory.

Marks are indicated against each question.

### **SECTION - A READING - 15 MARKS**

#### 1. Read the passage given below:

(5 Marks)

A park created by a Maharaja, the Keoladeo Ghana National Park, 176 km. from Delhi and 55 km. west of Agra and the Taj Mahal, is perhaps the only habitat created by a Maharaja. Two kilometres away from Bharatpur town, the royal family of Bharatpur developed the area in the late 19th Century.

The Maharaja constructed small dams for water conservation, diverted water from a nearby irrigation canal and soon thousands of water birds descended. The Maharaja, wanting to celebrate his success, invited dignitaries of British and Princely India to shoot waterfowl.

The sandstone in the park records the exploitation of those days. The first recorded shoot was by Lord Curzon in 1902. In 1956, the habitat shooting reserve became a sanctuary but the shooting continued until 1964. The sanctuary was upgraded to a National Park in 1981 and renamed Keoladeo Ghana.

This 29 sq. km. fresh water shallow swamp of Keoladeo Ghana with kadam, babul (Acacia nilotica) - ber and ficus trees has a rich aquatic vegetation, 50 species of fish, five species of amphibians, 28 species of reptiles and more than 366 species of birds (which include 32 species of birds of prey) and 27 species of animals like blackbuck, sambar, spotted deer, bluebull and 379 floral species.

The painted storks, like many other birds in Bharatpur during the monsoon, are local migrants. The highlight of the park is that it is the only known wintering area of the highly endangered central population of the Siberian cranes.

Migratory birds at the park start arriving in October for wintering. That wetlands help in maintaining the freshwater flow within river systems is a known fact. In Bharatpur, the shallow aquifiers of the Gangetic plain are recharged during the monsoon and from streams and wetlands in all seasons.

According to a report by Wetlands International, one-third of the world's wetlands are located in Asia.

Complete the following sentences based on your reading of the passage in your own words:

- a. The dams for water conservation served a dual purpose for the Maharaja because.....
- b. The purpose of the sandstone in the park is to .....
- c. The National Park is full of .....
- d. In winter the Keoladeo Ghana is visited by the famous.....
- e. The word in the fourth paragraph that means 'growing or living in or near water' is.....
- 2. Read the passage given below and write the option that you consider the most appropriate in your answer sheets. (5 Marks)

# THE DISGUISE ARTISTS

Aesop prawns start life as colourless, almost transparent infants who drift with the tide. On reaching maturity, they drift inshore, reach out to grasp the first passing seaweed and, once established upon it, they proceed to colour themselves to blend with it. After a week, their colouring is complete and they are safe from the closest scrutiny.

Should disaster strike and their chosen home be destroyed, they first try to find a new home with the same colour scheme as the first. If this proves impossible, they philosophically settle for a different coloured home and restart their own colouring process. A week zips past --- and they change colour to merge beautifully with their new homes once again. Aesop prawns also take on the colours of the day. Regularly at nightfall, they change to a deep transparent blue, reverting to their chosen house-colour as the sea lightens at dawn.

Interestingly, the "decision" to adopt a particular colour is in no way an act of will on the part of the prawn. Scattered over its body surface are small pigment cells, each containing a central bag of colours (a reservoir of primary pigments: red, yellow and blue) with five branches extending from it. These pigment cells are influenced by the light that falls directly on them or enters through the prawn's eyes. Different coloured lights activate the hormones that control the flow of pigments. And after dark, red and yellow are withdrawn to make way for the nocturnal blue 'night suit' of the Aesop prawn. A system that provides the animal, at all times, with an enviable cloak of invisibility.

- 1. The unique feature of Aesop prawns is that.....
  - a. they blend with their surroundings
  - b. they drift with the tide
  - c. they grasp seaweeds
  - d. they are transparent
- 2. When Aesop prawns are rendered homeless,.....
  - a. they change their colour

- b. they first look for a home of the same colour
- c. they cannot survive
- d. they become transparent
- 3. During the night Aesop prawns
  - a. change to a deep blue colour
  - b. take on their chosen house-colour
  - c. become red, yellow and blue
  - d. revert to light colours.
- 4. Colour change of Aesop prawns is influenced by
  - a. the will of the prawns
  - b. the light that falls on their body and eyes
  - c. the harmones that control the pigments
  - d. the five branches of its colour bag
- 5. A word from the passage that means the same as 'night like' is.....a. reverting
  - b. pigment
  - c. nocturnal
  - d. cloak
- 3. Read the poem given below and write the option that you consider the most appropriate in your answer sheets: (5 Marks)

#### Be the Best of Whatever You Are

**Douglas Malloch** 

If you can't be a pine on the top of the hill,

Be a scrub in the valley - but be

The best little scrub by the side of the rill;

Be a bush if you can't be a tree.

If you can't be a bush be a bit of the grass,

And some highway happier make;

If you can't be a muskie then just be a

bassBe the liveliest bass in the lake!

We can't all be captains, we've got to be crew,
There's something for all of us here,
There's big work to do, and there's lesser to do,
And the task you must do is the near.
If you can't be a highway then just be a trail,
If you can't be the sun be a star;
It isn't by size that you win or failBe the best of whatever you are!

1. Being the best little scrub tree is as good as being a......a.

- b. pine
- c. valley
- d. grass
- 2. 'Be the liveliest bass in the lake!' Here bass means......
  - a. water plant
  - b. edible fish
  - c. ship
  - d. sailor
- 3. 'We can't all be captains, we've got to be crew' means.....
  - a. we can be the best wherever we are
  - b. we should be a part of the crowd
  - c. we should not be ambitious
  - d. we should also be willing to serve
- 4. The message of the poem is.....
  - a. only the best is appreciated in life
  - b. if we fail the world will laugh at us
  - c. if we want to succeed in life, we must be strong
  - d. we must always be our best in anything we do
- 5. The tone of the poem is.....

- a. happy
- b. sad
- c. inspirational
- d. educational

#### **SECTION B WRITING - 15 MARKS**

4. A)Your brother, who is in a hostel, is very fond of eating street food. As a result, he keeps gettingsick. Write a letter in 100 words telling him about the harmful effects of junk food and advising him to eat healthy food. You are Arjun/ Arpita of C- 8, Lawrence Road, Amritsar.

B) You come across the photograph given below and are upset about even educated people breaking rules. Write a letter to the editor of Hindustan

Times, Kasturba Gandhi Marg, advocating the need to be abiding citizens. (100 words)



#### **SECTION - C GRAMMAR - 15 MARKS**

#### 7. Fill in the blanks choosing the most appropriate words from the given options.

# $(\frac{1}{2} \times 6 = 3 \text{ Marks})$

When Alexander and his men (a) .....the plain of Gaugamela, they found that the ground (b) ..... levelled. The Persian chariots stood in formation, ready to attack across that flat surface. Darius (c) ..... his scythed chariots to propel themselves forcefully into the Greek forces, with (d) ..... ripping at the flesh of both horses and men. The chariots began their rapid (e) ..... the army of Alexander the Great. The Greek general, (f) ..... a quick assessment of the situation, ordered the ranks of the Greek fighters to split apart.

- (a) (i) were reaching (ii) reach
  - (iii) reached
- (iv) have
- ( )
- (ii) is being
- (b) (i) had been

- made
- (iii) is made (iv) was made

(c) (i) has expected	(ii) did expect
(iii) had expected (d) (i) there carved blades	(iv) expected (ii) they're curved blades
(iii) their curved blades	(iv) they curving blades
(e) (i) drove to	(ii) drive towards
(iii) drives to	(iv) driven along
(f) (i) having made	(ii) have made
(iii) had to make	(iv) is having to make

8. Complete the headlines by choosing the correct answers from the options given below:

(3 Marks)

#### (a) 12 injured as buses collide:

\_\_\_\_\_ at the K.N.P. junction yesterday.

- (i) 12 persons were injured as two buses collided
- (ii) 12 persons have been injured when two buses collided
- (iii) 12 persons had been injure as two buses collided
- (iv) 12 persons are injured as two buses collide

# (b) Drive against Liquor Mafia launched

The police \_\_\_\_\_\_ engaged in smuggling of liquor to the state.

- (i) has launched a drive against the mafia who have
- (ii) have launched a drive against the mafia that is
- (iii)had launched a drive against mafia that will be
- (iv)had launched a drive against mafia who were

#### (c) China develops medical robot

A polytechnic university in China \_\_\_\_\_\_ that can conduct surgeries.

- (i) have developed a medical robot
- (ii) has developed a medical robot
- (iii)is developing a medical robot
- (iv)will be developing a medical robot

9. The following passage has not been edited. There is an error in each line against which a blank is given. Write the incorrect word and the correction in your answer sheet against the correct blank number as given in the example.

	Remember to underline the word that you have	ave supplied:	(3 Marks)
	Chocolate can make peoples happy.	peoples - <b>people</b> (example)	
	Chocolate are also considered very	(a)	
	good in health. One	(b)	
	bar off chocolate	(C)	
	have more protein than one banana.	(d)	
	You might had heard people saying	(e)	
10	that chocolates spoiled the teeth. Look at the words and phrases below. sentencesas shown in the example.	(f) Rearrange them to form (3 Marks)	n meaningful

**Example:** important / it / is / to observe / rules / traffic It is

important to observe traffic rules.

(a) not / children / below / of / the age / must / drive / eighteen years.

- (b) protection / our / we / must /helmets / own / wear / for
- (c) phones / must / used / not / mobile / be / driving / while
- 11.Read the comic strip and fill in the blanks in the passage given below by choosing the correct options. (3 Marks)



One morning while reading the paper, Raj told his wife (a)...... His wife, Molly, said that she thought (b)..... as he had run away with Rs 5 million.

## SECTION - D TEXT BOOKS-

# 12. (a) Read the extract given below and answer the questions that follow: (4 Marks)

My dear fellow... I'm so glad, and so on...Yes, indeed, and all that sort of thing. *[embraces and kisses Lomov]* I've been hoping for it for a long time. It's been my continual desire. *[sheds a tear]* And I've always loved you, my angel, as if you were my own son. May God give you both - His help and His love and so on, and so much hope... What am I behaving in this idiotic way for? I'm off my balance with joy, absolutely off my balance! Oh, with all my soul..., A. Who is the speaker of these lines?

- B. What purpose did the speaker initially suspect the guest had for visiting?
- C. Why was the speaker glad?
- D. Why does the speaker's joy not last long?

#### 12. (b) Read the extract given below and answer the questions that follow: (4 marks)

Her first journey - what careful, painstaking, elaborate plans she had had to make for it! She had thriftily saved whatever stray coins came her way, resisting every temptation to buy peppermints, toys, balloons, and the like, and finally she had saved a total of sixty paise. How difficult it had been, particularly that day at the village fair, but she had resolutely stifled a strong desire to ride the merry go- round, even though she had the money. A. Who does 'her' refer to in the passage?

- B. Where was her first journey made to?
- C. Why had she resisted all temptations?
- D. Find a word in the passage that means 'with determination'.
- 13.Read the extracts given below and answer the questions that follow by choosing the most appropriate options from those given below. [All questions are compulsory] (3x2=6 Marks)

Option: a. It sits looking

over harbor and city on silent haunches and then moves on.

- A. The 'it' in these lines is.....
  - a. a tree
  - b. the fog
  - c. a cat

- d. the wind
- B. "It" has been compared to a.....
  - a. dog
  - b. man
  - c. cat
  - d. night

C. The figure of speech used in these lines is.....

- a. simile
- b. metaphor
- c. personification
- d. repetition

Option: b. Pistol in his left hand, pistol in his right,

And he held in his teeth a cutlass bright,

His beard was black, one leg was wood;

It was clear that the pirate meant no good.

- A. Who held the pistols?
  - a. a child
  - b. a dragon
  - c. a pirate
  - d. Belinda
- B. What did the Dragon do to him?
  - a. became his friend
  - b. scared him
  - c. ate him
  - d. screamed at him
- C. What does the expression 'the pirate meant no good' convey?
  - a. that he was fierce and cruel
  - b. that he was brave and fearless
  - c. that he was going to do some harm

d. that he was not a good person

#### **Option: c. The leaves strain toward the glass**

#### small twigs stiff with exertion

long-cramped boughs shuffling under the roof like newly discharged patients half-dazed, moving 0 to the clinic doors.

- A. Why do the leaves strain toward the glass?
  - a. to breathe
  - b. to be with other trees
  - c. to escape captivity
  - d. to celebrate with animals
- B. What are branches compared to?
  - a. doctor's clinic
  - b. lazy persons
  - c. little twigs
  - d. patients
- C. What is the figure of speech in 'like newly discharged patients'?
  - a. Metaphor
  - b. personification
  - c. simile
  - d. onomatopoeia

#### 14. Answer all the following questions in 40-50 words each.

- 1. What was Valli's favourite pastime?
- 2. What is the story about the Kodavu people's descent?
- 3. When would the baker come everyday? Why did the children run to meet him?
- 4. After her son's death, why does Kisa Gotami go from house to house? Why does she not

(2X3=6 Marks)

get what she wants?

# 15.Answer the following question in about 80 words. (5 Marks)

1.On what issues did Lomov and Natalya quarrel? What does their quarrel reveal about them?

2. How did the Budha make Kisa Gotami understand the inevitability of death?

# 16. Answer the following question in about 80 words. (4 Marks)

1. How do the three nursery rhymes frighten Think Tank?

2.Losing a necklace changed the course of Loisel's life. How did this happen?

# 17.Answer all the following questions in 40-50 words each. (2X3=6 Marks)

- a. How did Bholi's teacher play an important role in changing the course of her life?
- b. Mention any two of Ebrights' contributions to the world of science.
- c. What was the lawyer's first impression of Lutkins? Was he correct?

# पीएम श्री केंद्रीय विद्यालय सिवनी

# शीतकालीन अवकाश गृहकार्य - 2024

# विषय - हिंदी

# कक्षा -10

- प्रश्न- 1. वन विभाग में वनरक्षक पद हेतु आप अपना एक संक्षिप्त स्व-वृत्त (बायोडाटा) 80 शब्दों में तैयार कीजिए।
- प्रश्न- 2. हिंदी दिवस के अवसर पर हिंदी शिक्षक को भावपूर्ण संदेश लगभग 40 शब्दों में लिखिए।
- प्रश्न- 3. आप दूध डेरी चलाते हैं , उस संबंध 40 शब्दों में एक आकर्षक विज्ञापन तैयार कीजिए।

प्रश्न - 4. बोर्ड परीक्षाओं के दौरान शहर में हो रहे डीजे साउंड से आप परेशान है। इस संबंध में शिकायत हेतु जिला कलेक्टर को एक ईमेल लिखिए।

- प्रश्न 5. किसी एक विषय पर लगभग 120 शब्दों में एक अनुच्छेद लिखिए।
- स्वच्छ भारत अभियान
- आत्मनिर्भर भारत
- मोबाइल का समाज पर प्रभाव
- प्रश्न 6. क्षितिज एवं कृतिका हिंदी पाठयपुस्तक के पठित पाठ्यक्रम के प्रश्नोत्तर याद कीजिए।
- प्रश्न 7. अलंकार, पद परिचय एवं वाच्य परिवर्तन को सोदाहरण लिखकर याद कीजिए।



# PM SHRI KENDRIYA VIDYALAYA SEONI

# WINTER BREAK HOMEWORK

#### CLASS -10

subject-AI

- SOLVE DAILY TEST SERIES IN YOUR NOTEBOOK.
- ▶ REVISE BOTTH EMPLOYBILITY SKILLS AND AI THOROUGHLY.
- MAKE A LIST OF DOUBTS.
- SOLVE THE SAMPLE QUESTION PAPER WITHIN A DURATION OF 2 HRS
- NOTE- DAILY TEST SERIES WILL BE SHARED ON YOUR WHATSAPP GROUP . SOLVE IT IN YOUR NOTEBOOK.

# **CBSE | DEPARTMENT OF SKILL EDUCATION** ARTIFICIAL INTELLIGENCE (SUBJECT CODE - 417)

# BLUE PRINT FOR SAMPLE QUESTION PAPER - 1 (PRACTICE PAPER-1) CLASS X (SESSION 2024-2025)

Max. Time: 2 Hours

Max. Marks: 50

# PART A - EMPLOYABILITY SKILLS (10 MARKS):

UNIT	NAME OF THE UNIT	OBJECTIVE TYPE QUESTIONS	SHORT ANSWER TYPE QUESTIONS	
NO.		1 MARK EACH	2 MARKS EACH	QUESTIONS
1	Communication Skills -II	1	1	2
2	Self-Management Skills - II	2	1	3
3	ICT Skills - II	1	1	2
4	Entrepreneurial Skills - II	1	1	2
5	Green Skills - II	1	1	2
TOTAL QUESTIONS		6	5	11
NO.	OF QUESTIONS TO BE ANSWERED	Any 4	Any 3	07
TOTAL MARKS		1 x 4 = 4	2 x 3 = 6	10 MARKS

# PART B - SUBJECT SPECIFIC SKILLS (40 MARKS):

UNIT NO.	NAME OF THE UNIT	OBJECTIVE TYPE QUESTIONS	SHORT ANSWER TYPE QUESTIONS	DESCRIPTIVE/ LONG ANS. TYPE QUESTIONS	TOTAL QUESTIONS
1	Introduction to AI	5	1	1	7
2	AI Project Cycle	3	1	2	6
3	Advance Python	-	-	-	-
4	Data Sciences	3	1	-	4
5	Computer Vision	3	1	-	4
6	Natural Language Processing	5	1	1	7
7	Evaluation	5	1	1	7
т	OTAL QUESTIONS	24	6	5	35
NO. OF QUESTIONS TO BE ANSWERED		20	Any 4	Any 3	27
	TOTAL MARKS	1 x 20 = 20	2 x 4 = 8	4 x 3 = 12	40 MARKS

# **CBSE | DEPARTMENT OF SKILL EDUCATION**

# **ARTIFICIAL INTELLIGENCE (SUBJECT CODE - 417)**

SAMPLE QUESTION PAPER - 1 (PRACTICE PAPER-1) CLASS X (SESSION 2024-2025)

Max. Time: 2 Hours

# **General Instructions:**

- 1. Please read the instructions carefully.
- 2. This Question Paper consists of 21 questions in two sections: Section A & Section B.
- 3. Section A has Objective type questions whereas Section B contains Subjective type questions.
- 4. Out of the given (5 + 16 =) 21 questions, a candidate has to answer (5 + 10 =) 15 questions in the allotted (maximum) time of 2 hours.
- 5. All questions of a particular section must be attempted in the correct order.

#### 6. SECTION A - OBJECTIVE TYPE QUESTIONS (24 MARKS):

- i. This section has 05 questions.
- ii. Marks allotted are mentioned against each question/part.
- iii. There is no negative marking.
- iv. Do as per the instructions given.
- 7. SECTION B SUBJECTIVE TYPE QUESTIONS (26 MARKS):
  - i. This section has 16 questions.
  - ii. A candidate has to do 10 questions.
  - iii. Do as per the instructions given.
  - iv. Marks allotted are mentioned against each question/part.

Max. Marks: 50

# **SECTION A: OBJECTIVE TYPE QUESTIONS**

Q. 1	Answer any 4 out of the given 6 questions on Employability Skills (1 x 4 = 4 marks)	
i.	"M D Gulati started with a small shop with his focus, dedication and clear ideas, MDH became one of the most popular brands in India besides having a good reputation all over the world". Which self-management skill is clearly visible in the given statement?	1
ii.	<ul> <li>When you bring the mouse over a file in File Explorer, it will show the details of that file.</li> <li>This is known as <ul> <li>(a) Drag and drop</li> <li>(b) Double click</li> <li>(c) Hover</li> <li>(d) Single click</li> </ul> </li> </ul>	1
iii.	<ul> <li>Assertion(A): A doctor works for a renowned hospital.</li> <li>Reason(R): The statement given above is an example of wage employment.</li> <li>(a) Both A and R are correct and R is the correct explanation of A</li> <li>(b) Both A and R are correct but R is NOT the correct explanation of A</li> <li>(c) A is correct but R is not correct</li> <li>(d) A is not correct but R is correct</li> </ul>	1
iv.	the work is all about identifying and noting how we spent our time, and analysing how to spend our time effectively. (a) Organising (b) Prioritising (c) Controlling (d) Tracking	1
v.	Remya traveled to Sweden from India to pursue her higher education. But she doesn't know how to speak Swedish (language of Sweden). Because of this, she was unable to find a part time job. This is an example of (a) Interpersonal barrier (b) Physical barrier (c) Organisational barrier (d) Linguistic barrier	1
vi.	<ul> <li>"Efforts are made to increase the solar power generation so that our electricity needs are met and at the same time we do not pollute the environment or use up natural resources".</li> <li>Which SDG can you relate this statement to?</li> <li>(a) Life on land</li> <li>(b) Clean water and sanitation</li> <li>(c) Affordable and clean energy</li> <li>(d) Reduced inequalities</li> </ul>	1

Q. 2	Answer any 5 out of the given 6 questions $(1 \times 5 = 5 \text{ marks})$	
i.	<ul> <li>Assertion (A)- One can be a good singer while the other can be a great athlete.</li> <li>Reason(R) - Humans possess different types of intelligences but at different levels.</li> <li>(a) Both A and R are correct and R is the correct explanation of A</li> <li>(b) Both A and R are correct but R is not the correct explanation of A</li> <li>(c) A is correct but R is not correct</li> <li>(d) A is not correct but R is correct.</li> </ul>	1
ii.	The Indian Government banned a few apps stating – "servers in the hostile nation are receiving and using the acquired data improperly". Which terminology suits best for this action? (a) AI Ethics (b) Data Privacy (c) AI Bias (d) AI Access	1
iii.	<ul> <li>Statment1: There are four layers in a neural network.</li> <li>Statement2:The first layer of the neural network is known as the output layer.</li> <li>(a) Both Statement1 and Statement2 are correct</li> <li>(b) Both Statement1 and Statement2 are incorrect</li> <li>(c) Statement1 is correct but Statement2 is incorrect</li> <li>(d) Statement2 is correct but Statement1 is incorrect</li> </ul>	1
iv.	Observe the given graph and fill in the blank:	1
ν.	<ul> <li>is a simple file format that stores data separated by commas.</li> <li>(a) jpg</li> <li>(b) doc</li> <li>(c) csv</li> <li>(d) png</li> </ul>	1
vi.	A corpus contains 4 documents in which the word 'diet' was appearing once in document1. Identify the term in which we can categorise the word 'diet'. (a) Stop word (b) Rare word (c) Frequent word (d) Removable word	1

Q. 3	Answer any 5 out of the given 6 questions (1 x 5 = 5 marks)	
i.	Read the examples given below- i. Using Chat GPT to write an email ii. Face unlock technology of mobile phones using camera iii. Turning off lights with IoT device iv. Hand sanitizer dispenser having sensor Choose the options that are <b>not</b> AI (a) i and ii (b) iii and i (c) iii and iv (d) i, iii and iv	1
ii.	refer to the type of features that we want to collect.	1
iii.	<ul> <li>Which of the following is an application of data science?</li> <li>(a) Text summarization</li> <li>(b) Target Advertisements</li> <li>(c) Face lock in smartphones</li> <li>(d) Email filters</li> </ul>	1
iv.	<ul> <li>is the process of finding instances of real-world objects in images or videos.</li> <li>(a) Instance segmentation</li> <li>(b) Object detection</li> <li>(c) Classification</li> <li>(d) Image segmentation</li> </ul>	1
ν.	Identify the given Chat bot type: It learns from its environment and experience. It also builds on its capabilities based on the knowledge. These can collaborate with humans, working along-side them and learning from their behavior.	1
vi.	F1 Score is the measure of the balance between (a) Accuracy and Precision (b) Precision and Recall (c) Recall and Accuracy (d) Recall and Reality	1

Q. 4	Answer any 5 out of the given 6 questions (1 x 5 = 5 marks)	
i.	Srishti learnt about AI terminologies but was not able to recollect the term that is used to refer to machines that perform tasks with vast amounts of data using neural networks. Help her with the correct term.	1
ii.	<ul> <li>Statment1: The output given by the AI model is known as reality.</li> <li>Statement2:The real scenario is known as Prediction. <ul> <li>(a) Both Statement1 and Statement2 are correct</li> <li>(b) Both Statement1 and Statement2 are incorrect</li> <li>(c) Statement1 is correct but Statement2 is incorrect</li> <li>(d) Statement2 is correct but Statement1 is incorrect</li> </ul> </li> </ul>	1

	-	
iii.	<ul> <li>Rajat has made a model which predicts the performance of Indian Cricket players in upcoming matches. He collected the data of players' performance with respect to stadium, bowlers, opponent team and health. His model works with good accuracy and precision value. Which of the statement given below is incorrect?</li> <li>(a) Data gathered with respect to stadium, bowlers, opponent team and health is known as Testing Data.</li> <li>(b) Data given to an AI model to check accuracy and precision is Testing Data.</li> <li>(c) Training data and testing data are acquired in the Data Acquisition stage.</li> <li>(d) Training data is always larger as compared to testing data.</li> </ul>	1
iv.	How many channels does a colour image have?	1
ν.	<ul> <li>Which feature of NLP helps in understanding the emotions of the people mentioned with the feedback?</li> <li>(a) Virtual Assistants</li> <li>(b) Sentiment Analysis</li> <li>(c) Text classification</li> <li>(d) Automatic Summarization</li> </ul>	1
vi.	Sarthak made a face mask detector system for which he had collected the dataset and used all the dataset to train the model. Then, he used the same data to evaluate the model which resulted in the correct answer all the time but was not able to perform with unknown dataset. Name the concept.	1

Q. 5	Answer any 5 out of the given 6 questions (1 x 5 = 5 marks)		
i.	<ul> <li>Aditi, a student of class XII developed a chatbot that clarifies the doubts of Economis students. She trained the software with lots of data sets catering to all difficulty leve If any student would type or ask questions related to Economics, the software would give an instant reply. Identify the domain of AI in the given scenario.</li> <li>(a) Computer Vision</li> <li>(b) Data Science</li> <li>(c) Natural Language Processing</li> <li>(d) None of these</li> </ul>		
ii.	Which evaluation parameter takes into consideration all the correct predictions?	1	
iii.	<ul> <li>means a picture element which is the smallest unit of information that makes up a picture.</li> <li>(a) Vision</li> <li>(b) Pics</li> <li>(c) Pixel</li> <li>(d) Piskel</li> </ul>	1	
iv.	<ul> <li>What do you mean by syntax of a language?</li> <li>(a) Meaning of a sentence</li> <li>(b) Grammatical structure of a sentence</li> <li>(c) Semantics of a sentence</li> <li>(d) Synonym of a sentence</li> </ul>	1	

v.	<ul> <li>Which algorithms result in two things, a vocabulary of words and frequency of the words in the corpus?</li> <li>(a) Sentence segmentation</li> <li>(b) Tokenisation</li> <li>(c) Bag of words</li> <li>(d) Text normalisation</li> </ul>	1
vi.	<ul> <li>Which one of the following scenario result in a high false positive cost?</li> <li>(a) viral outbreak</li> <li>(b) forest fire</li> <li>(c) flood</li> <li>(d) spam filter</li> </ul>	1

# **SECTION B: SUBJECTIVE TYPE QUESTIONS**

# Answer any 3 out of the given 5 questions on Employability Skills (2 x 3 = 6 marks)

Answer each question in 20 – 30 words.

Q. 6	List two best practices for effective communication.	
Q. 7	What is the importance of setting goals in life?	
Q. 8	"The Trojan Horse was a wooden horse said to have been used by the Greeks during the Trojan War to enter the city of Troy and win the war". What does Trojan horse mean in computer terminology?	2
Q. 9	How is society helping entrepreneurs in their business?	2
Q. 10	Mention any two human activities that lead to environmental degradation.	

## Answer any 4 out of the given 6 questions in 20 – 30 words each (2 x 4 = 8 marks)

Q. 11	All of us use smartphones. When we install a new app, it asks us for several permissions to access our phone's data in different ways. Why do apps collect such data?			
Q. 12	Sirisha and Divisha want to make a model which will organize the unlabeled input data into groups based on features. Which learning model should they use and why?			
Q. 13	Ajay wants to access data from various sources. Suggest him any two points that he needs to keep in mind while accessing data from any data source.	2		
Q. 14	Explain the term resolution with an example.			
Q. 15	Identify any two stop words which should not be removed from the given sentence and why? Get help and support whether you're shopping now or need help with a past purchase. Contact us at <u>abc@pwershel.com</u> or on our website <u>www.pwershel.com</u>	2		
Q. 16	Draw the confusion matrix for the following data • the number of true positive = 100	2		
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<ul> <li>the number of true negative 47</li> <li>the number of false positive = 62</li> <li>the number of false negative = 290</li> </ul>	

# Answer any 3 out of the given 5 questions in 50–80 words each (4 x 3 = 12 marks)

Q. 17	Your grandmother watches you use AI applications. She wants to understand more about it. Help her understand the term artificial intelligence by giving the right definition and explain to her with an example how machines become artificially intelligent.						
Q. 18	Akhil wants to learn how to scope the problem for an AI Project. Explain him the following: (a) 4W Problem Canvas (b) Problem Statement Template				4		
Q. 19	9 Identify and explain the types of the learning-based approaches in the figures given below.						
			Vhat am I?	I think you're a dog.			
			Figure 1				
Image: Second							
	Figure 2						
Q. 20	We, human beings, can read, write and understand many languages. But computers can understand only machine language. Do you think we might face any challenges if we try to teach computers how to understand and interact in human languages? Explain.				4		
Q. 21	An AI model made th have recently launche	e following sales pred ed:	liction for a new mo	bile phone which they	4		
	Reality						
	Confusio	n Matrix	Yes	No			
	Prodiction	Yes	50	40			
	Prediction	No	12	10			
<ul><li>(i) Identify the total number of wrong predictions made by the model.</li><li>(ii) Calculate precision, recall and F1 Score.</li></ul>							