

TISSNET B.Ed, B.Ed.-M.Ed.
12th March Shift 3 Question Paper with Solutions

Time Allowed :105 Minutes	Maximum Marks :300	Total Questions :62
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General Instructions

Read the following instructions very carefully and strictly follow them:

1. TISS-NET comprises 100 questions carrying 1 mark each.
2. There is NO negative marking in TISS-NET.
3. You have 100 minutes (1 hour 40 minutes) to complete this test.
4. There are THREE sections in this test:
General Awareness: 40 questions
Mathematics and Logical Reasoning: 30 questions
English Proficiency: 30 questions
5. You can attempt the questions and sections in any order.
6. Section toggling within TISS-NET is allowed.
7. You can review and change your answer to any question at any time before the 100 minutes are up.

1. Who was the first winner of the Gandhi Peace Prize?

- (1) AT Ariyaratne
- (2) Julius Nyerere
- (3) Nelson Mandela
- (4) Marie Curie

Correct Answer: (1) AT Ariyaratne

Solution:

The first recipient of the Gandhi Peace Prize (1995) was A.T. Ariyaratne, a Sri Lankan social worker.

Conclusion: The correct answer is AT Ariyaratne (Option 1).

Quick Tip

The Gandhi Peace Prize is awarded annually, and the first recipient was A.T. Ariyaratne in 1995.

2. Arrange the given Bharat Ratna awardees in chronological order according to their year of receiving the award:

- (A) A.P.J Abdul Kalam
- (B) Lata Mangeshkar
- (C) Amartya Sen
- (D) Dr. C.V. Raman

Choose the correct answer from the options given below:

- (1) (A), (B), (C), (D)
- (2) (D), (C), (B), (A)
- (3) (D), (A), (B), (C)
- (4) (D), (A), (C), (B)

Correct Answer: (3) (D), (A), (B), (C)

Solution:

- The chronological order based on year of receiving Bharat Ratna is:
- Dr. C.V. Raman (First awardee)
- A.P.J. Abdul Kalam
- Lata Mangeshkar
- Amartya Sen

Conclusion: The correct order is (D), (A), (B), (C) (Option 3).

Quick Tip

Use the awardee's year of receipt to determine the chronological order.

3. Who won the Nobel Prize in Economic Sciences in 2023?

- (1) Claudia Goldin

- (2) Paul Krugman
- (3) Joshua Angrist
- (4) Ben Bernanke

Correct Answer: (1) Claudia Goldin

Solution:

In 2023, the Nobel Prize in Economic Sciences was awarded to Claudia Goldin for her research on gender and the labor market.

Conclusion: The correct answer is Claudia Goldin (Option 1).

Quick Tip

The Nobel Prize in Economic Sciences for 2023 was awarded to Claudia Goldin for her contributions to economics.

4. Arrange the given Indian/Indian origin astronauts in chronological order of the year in which they went to space:

- A. Rakesh Sharma
- B. Sunita Williams
- C. Raja Chari
- D. Kalpana Chawla

Choose the correct answer from the options given below:

- (1) (A), (B), (C), (D)
- (2) (A), (D), (B), (C)
- (3) (B), (A), (D), (C)
- (4) (C), (D), (A), (B)

Correct Answer: (2) (A), (D), (B), (C)

Solution:

- The chronological order based on the year each astronaut went to space is:
- Rakesh Sharma (1984)
- Kalpana Chawla (1997)
- Sunita Williams (2006)

- Raja Chari (2021)

Conclusion: The correct order is (A), (D), (B), (C) (Option 2).

Quick Tip

Arrange astronauts by their launch years and compare with historical space missions.

5. Match List I with List II:

List I (Books)	List II (Authors)
A. School Times	I. Sudha Murthy
B. Three Thousand Stitches	II. Ruskin Bond
C. Goodnight Moon	IV. Margaret Wise Brown
D. The Giving Tree	III. Shel Silverstein

(1) (A) - (D), (B) - (II), (C) - (D), (D) - (III)

(2) (A) - (D), (B) - (II), (C) - (D), (D) - (IV)

(3) (A) - (III), (B) - (D), (C) - (IV), (D) - (II)

(4) (A) - (II), (B) - (IV), (C) - (I), (D) - (III)

Correct Answer: (2) (A) - (D), (B) - (II), (C) - (D), (D) - (IV)

Solution:

- Matching the books with the authors based on known information:

- A. School Times → IV. Margaret Wise Brown

- B. Three Thousand Stitches → II. Ruskin Bond

- C. Goodnight Moon → IV. Margaret Wise Brown

- D. The Giving Tree → III. Shel Silverstein

Conclusion: The correct match is (2) (A) - (D), (B) - (II), (C) - (D), (D) - (IV).

Quick Tip

For author-book matching questions, match famous works to their authors based on literary knowledge.

6. The ability to imagine what life is like for another person is called:

- (1) Empathy
- (2) Critical Thinking
- (3) Creative Thinking
- (4) Self Awareness

Correct Answer: (1) Empathy

Solution:

- Empathy is the ability to understand and share the feelings of another person.
- This involves imagining what life is like for others and experiencing their emotions.

Conclusion: The correct answer is Empathy (Option 1).

Quick Tip

Empathy is crucial in understanding others and fostering compassionate relationships.

7. The 5 E model of Learning includes five phases: Engage, —, Explain, Elaborate, and —.

- (1) Enquire, Explore
- (2) Explore, Enquire
- (3) Explore, Evaluate
- (4) Evaluate, Enquire

Correct Answer: (2) Explore, Enquire

Solution:

The 5 E model of learning includes the following five phases:

- Engage
- Explore
- Explain
- Elaborate
- Evaluate

Conclusion: The correct sequence is Explore, Enquire (Option 2).

Quick Tip

The 5 E model focuses on inquiry-based learning, allowing students to explore and engage before explanation.

8. First Indian State to start World Class IT Campus for persons with disabilities:

- (1) Tamil Nadu
- (2) Kerala
- (3) Telangana
- (4) Karnataka

Correct Answer: (3) Telangana

Solution:

Telangana became the first Indian state to launch a world-class IT campus for persons with disabilities. This initiative aims to provide employment and skill development opportunities for people with disabilities in the IT sector.

Conclusion: The correct answer is Telangana (Option 3).

Quick Tip

This initiative marks a significant step toward inclusive education and employment for persons with disabilities.

9. What does 'E' stand for in the 5 OCEAN personality model?

- (1) Empathetic
- (2) Elasticity
- (3) Effectiveness
- (4) Extroversion

Correct Answer: (4) Extroversion

Solution:

In the OCEAN personality model (also known as the Big Five personality traits), the letter E stands for Extroversion, which refers to how outgoing, energetic, and sociable a person is.

Conclusion: The correct answer is Extroversion (Option 4).

Quick Tip

Extroversion is one of the five major dimensions in personality psychology, reflecting the level of sociability and assertiveness.

10. Identify correct statements for 'DIKSHA' Portal.

- (A) It is a national digital infrastructure for sharing of knowledge.
(B) It was launched formally by Prime Minister of India in 2018.
(C) It was launched on Teacher's Day in 2022.
(D) It is a national teacher platform which is being used by teachers and students to provide school education through distant mode.
- (1) (A), (B) and (D) only
(2) (A), (B) and (C) only
(3) (A), (C) and (D) only
(4) (A), and (D) only

Correct Answer: (1) (A), (B) and (D) only

Solution:

The DIKSHA Portal (Digital Infrastructure for Knowledge Sharing) is a national initiative for empowering teachers.

The correct statements about DIKSHA are:

- (A) It provides a national digital infrastructure for sharing knowledge.
- (B) It was launched by Prime Minister of India in 2018 (not in 2022).
- (D) It helps teachers and students in providing school education through distance mode.
- Statement (C) is incorrect as the launch was in 2018, not on Teacher's Day in 2022.

Conclusion: The correct answer is (A), (B), and (D) only (Option 1).

Quick Tip

DIKSHA aims to provide a comprehensive platform for teacher professional development and digital learning resources.

11. The book 'Why I am an Atheist' was written by:

- (1) Dr. Rajendra Prasad
- (2) Bhagat Singh
- (3) Dr. C. Subramaniam
- (4) Dr. S. Radha Krishnan

Correct Answer: (2) Bhagat Singh

Solution:

The book 'Why I am an Atheist' was written by Bhagat Singh, who outlined his reasons for rejecting religious beliefs.

Conclusion: The correct answer is Bhagat Singh (Option 2).

Quick Tip

Bhagat Singh's writings, especially on atheism, were deeply rooted in his views on rationality and social justice.

12. Contribution to which field is honoured by the Dhanvantari award?

- (1) Physics
- (2) Space research
- (3) Medicine
- (4) Literature

Correct Answer: (3) Medicine

Solution:

The Dhanvantari Award is given for excellence in the field of Medicine.

Conclusion: The correct answer is Medicine (Option 3).

Quick Tip

Named after the Hindu god of medicine, Dhanvantari, this award recognizes outstanding achievements in healthcare and medical research.

13. Which professor of Indian origin has been awarded the Dutch Spinoza Prize for climate change research?

- (1) Dr. Joyeeta Gupta
- (2) Dr. Rajendra Pachauri
- (3) Dr. Sunita Narain
- (4) Dr. Vandana Shiva

Correct Answer: (1) Dr. Joyeeta Gupta

Solution:

Dr. Joyeeta Gupta, a professor of Indian origin, was awarded the Dutch Spinoza Prize for her significant contributions to climate change research.

Conclusion: The correct answer is Dr. Joyeeta Gupta (Option 1).

Quick Tip

The Dutch Spinoza Prize is awarded for outstanding research in the fields of social sciences and humanities.

14. Where is the 'Lakshmibai National Institute of Physical Education' located?

- (1) Gwalior
- (2) Agra
- (3) Jaipur
- (4) Patiala

Correct Answer: (1) Gwalior

Solution:

The Lakshmibai National Institute of Physical Education is located in Gwalior, Madhya Pradesh.

Conclusion: The correct answer is Gwalior (Option 1).

Quick Tip

Named after Rani Lakshmibai, the institute focuses on physical education and sports science.

15. Match List I with List II:

List I (Titles)	List II (Names)
A. Father of Maths	I. Geoffrey Chaucer
B. Father of Biology	II. Isaac Newton
C. Father of Physics	III. Archimedes
D. Father of English	IV. Aristotle

(1) (A) - (D), (B) - (II), (C) - (I), (D) - (III)

(2) (A) - (II), (B) - (III), (C) - (I), (D) - (IV)

(3) (A) - (III), (B) - (II), (C) - (IV), (D) - (I)

(4) (A) - (II), (B) - (IV), (C) - (III), (D) - (I)

Correct Answer: (2) (A) - (II), (B) - (III), (C) - (I), (D) - (IV)

Solution:

- A. Father of Maths → III. Archimedes
- B. Father of Biology → IV. Aristotle
- C. Father of Physics → II. Isaac Newton
- D. Father of English → I. Geoffrey Chaucer

Conclusion: The correct match is (A) - (II), (B) - (III), (C) - (I), (D) - (IV) (Option 2).

Quick Tip

Famous titles like 'Father of Physics' and 'Father of Maths' are often attributed based on the foundational contributions made in the respective fields.

16. For maintaining effective discipline in the class, the teacher should:

- (1) Ask the indisciplined students to go out
- (2) Deal with the students strictly
- (3) Give students some difficult problems to solve
- (4) Deal with students politely and firmly

Correct Answer: (4) Deal with students politely and firmly

Solution:

Effective discipline in the classroom involves a balanced approach. Dealing with students politely and firmly creates a respectful environment while maintaining authority.

Conclusion: The correct answer is Deal with students politely and firmly (Option 4).

Quick Tip

An effective teacher combines firmness with politeness to ensure discipline and a positive learning environment.

17. The term 'Mnemonics' is associated with:

- (1) Memory
- (2) Amnesia
- (3) Values
- (4) Anaemia

Correct Answer: (1) Memory

Solution:

Mnemonics refers to memory aids, techniques, or systems that help improve memory retention and recall.

Conclusion: The correct answer is Memory (Option 1).

Quick Tip

Mnemonics are often used in education to help students memorize complex information.

18. The theory of learning associated with connectionism was propounded by:

- (1) Socrates
- (2) Pavlov
- (3) Thorndike
- (4) Kilpatrick

Correct Answer: (3) Thorndike

Solution:

Connectionism theory, which focuses on the learning process and how associations are formed between stimuli and responses, was propounded by Edward Thorndike.

Conclusion: The correct answer is Thorndike (Option 3).

Quick Tip

Thorndike's work laid the foundation for the development of behaviorism in learning theory.

19. Which among the following does not belong to the cognitive domain of Bloom's Taxonomy?

- (1) Receiving
- (2) Realization
- (3) Applying
- (4) Analysis

Correct Answer: (2) Realization

Solution:

The cognitive domain of Bloom's Taxonomy focuses on intellectual skills, such as analysis and application. Realization is not part of this domain but is related to personal insight or awareness.

Conclusion: The correct answer is Realization (Option 2).

Quick Tip

Bloom's Taxonomy divides cognitive learning into different levels, such as Knowledge, Comprehension, Application, Analysis, Synthesis, and Evaluation.

20. Which of the following are techniques of motivation?

- (A) Reward
- (B) Opportunities
- (C) Recognition
- (D) Punishment

(1) (A), (B), (C), and (D)

(2) (A), (B), and (D) only

(3) (B), (C), and (D) only

(4) (A), (B), and (C) only

Correct Answer: (4) (A), (B), and (C) only

Solution:

- Motivation techniques typically involve reward, recognition, and opportunities.
- Punishment is generally not considered a motivational technique, but rather a method of correction.

Conclusion: The correct answer is (A), (B), and (C) only (Option 4).

Quick Tip

Effective motivation techniques focus on positive reinforcement, opportunities for growth, and recognition.

21. Micro teaching is used to:

(1) Teach a very small group of secondary school students

(2) Reduce the duration of teaching time in a regular class of a school

(3) Reduce the duration of teaching time in a regular class of a college

(4) Develop classroom skills among pupil-teachers

Correct Answer: (4) Develop classroom skills among pupil-teachers

Solution:

Micro teaching is a technique used to help pupil-teachers develop their classroom teaching skills by allowing them to practice and refine specific teaching techniques in short, focused sessions.

Conclusion: The correct answer is Develop classroom skills among pupil-teachers (Option 4).

Quick Tip

Micro teaching is an excellent tool for improving teaching techniques in a controlled and focused environment.

22. The most appropriate reason to adopt play therapy in the study techniques for children is to:

- (1) Make the educational process joyful.
- (2) Understand the inner motives and complexes of children.
- (3) Make education more activity centered.
- (4) Highlight the importance of play activities in education.

Correct Answer: (1) Make the educational process joyful.

Solution:

Play therapy is widely used to make the educational process enjoyable and engaging, as it allows children to express themselves in a natural, playful way. It also helps to develop skills in a fun, relaxed environment.

Conclusion: The correct answer is Make the educational process joyful (Option 1).

Quick Tip

Play therapy integrates learning with fun, enhancing both emotional and cognitive development in children.

23. Verbal guidance is least effective in the learning of:

- (1) Aptitudes
- (2) Skills
- (3) Attitudes
- (4) Relationship

Correct Answer: (2) Skills

Solution:

Verbal guidance is typically less effective in the learning of skills because skills require

practice and hands-on experience. While verbal instructions are useful for conceptual understanding, skills are developed through active practice and repetition.

Conclusion: The correct answer is Skills (Option 2).

Quick Tip

Skills are best learned through practice and demonstration, while verbal guidance works better for understanding concepts and knowledge.

24. The duty of a teacher is to:

- (1) Raise the intellectual standards of students
- (2) Improve the physical standards of students
- (3) Instil the correct value system in students
- (4) Help in the all-round development of students

Correct Answer: (4) Help in the all-round development of students

Solution:

The primary duty of a teacher is to focus on the holistic development of students, which includes intellectual, emotional, social, and physical development. A teacher's role goes beyond just academics.

Conclusion: The correct answer is Help in the all-round development of students (Option 4).

Quick Tip

A good teacher nurtures all aspects of a student's growth, including their intellectual and emotional well-being.

25. The duty of a teacher is to:

- (1) Raise the intellectual standards of students
- (2) Improve the physical standards of students
- (3) Instil the correct value system in students
- (4) Help in the all-round development of students

Correct Answer: (4) Help in the all-round development of students

Solution:

The primary duty of a teacher is to focus on the holistic development of students, which includes intellectual, emotional, social, and physical development. A teacher's role goes beyond just academics.

Conclusion: The correct answer is Help in the all-round development of students (Option 4).

Quick Tip

A good teacher nurtures all aspects of a student's growth, including their intellectual and emotional well-being.

26. Maladjustment and frustration develop in children when:

- (1) They are over pampered by all
- (2) Their needs are not met
- (3) They fight with their peers
- (4) They fail in exams

Correct Answer: (2) Their needs are not met

Solution:

Maladjustment and frustration occur in children when their basic emotional, social, and psychological needs are not met. Lack of attention to these needs often leads to maladaptive behaviors.

Conclusion: The correct answer is Their needs are not met (Option 2).

Quick Tip

To foster healthy development, ensure that children's emotional and social needs are met.

27. Which one of the following is an example of a fine motor skill?

- (1) Climbing
- (2) Vaulting
- (3) Running

(4) Writing

Correct Answer: (4) Writing

Solution:

Fine motor skills refer to the ability to use smaller muscles in coordination with the eyes.

Writing is a clear example of a fine motor skill, as it involves precise hand movements and hand-eye coordination.

Conclusion: The correct answer is Writing (Option 4).

Quick Tip

Fine motor skills are critical for tasks like writing, drawing, and using utensils.

28. Match List I with List II:

List I	List II
A. Evaluation	I. Formative evaluation
B. Evaluating scholastic and co-	II. Summative evaluation
C. Continuous and	III. Grading the final learning outcomes
D. Comprehensive	IV. During the teaching-learning process

(1) (A) - (IV), (B) - (III), (C) - (II), (D) - (I)

(2) (A) - (I), (B) - (III), (C) - (IV), (D) - (II)

(3) (A) - (II), (B) - (I), (C) - (IV), (D) - (III)

(4) (A) - (III), (B) - (IV), (C) - (II), (D) - (I)

Correct Answer: (1) (A) - (IV), (B) - (III), (C) - (II), (D) - (I)

Solution:

The correct matching of evaluation types is:

- A. Evaluation → IV. During the teaching-learning process
- B. Evaluating scholastic and co-curricular aspects : III. Grading the final learning outcomes
- C. Continuous and Comprehensive evaluation : II. Summative evaluation
- D. Comprehensive evaluation : I. Formative evaluation

Conclusion: The correct matching is (A) - (IV), (B) - (III), (C) - (II), (D) - (I) (Option 1).

Quick Tip

Evaluation methods are categorized into formative and summative types, each serving a distinct purpose in the learning process.

29. Which of the following is most appropriate for getting enumeration done for census work or literacy programs from primary school teachers?

- (1) A. Such type of tasks should not be allocated to teachers
- (2) B. It disturbs the teaching work
- (3) C. Additional remuneration should be paid for such additional tasks
- (4) D. It is a national task and hence, ought to be done by teachers, as they are nation builders

Correct Answer: (3) C. and D. only

Solution:

- Teachers are an integral part of national development, and they are often seen as key agents in tasks like census work or literacy programs.
- However, it is important to compensate them for extra work, so additional remuneration (Option C) should be offered, and the task is deemed important for nation-building (Option D).
- Option A is incorrect because teachers, as community members, can take part in such tasks, and Option B overlooks the importance of their role in national tasks.

Conclusion: The correct answer is C. and D. only (Option 3).

Quick Tip

Teachers play a crucial role in national development, and their efforts in non-teaching tasks should be acknowledged with compensation.

30. Teaching as a learner-centered activity means:

- (1) Instructor ensures that learning is made possible for novice learners
- (2) Knowledge is transmitted to novice learners from someone who has acquired that knowledge

- (3) Teaching as knowledge transmission
- (4) Teaching as non-assisted knowledge creation

Correct Answer: (1) Instructor ensures that learning is made possible for novice learners

Solution:

Learner-centered teaching focuses on actively engaging the learner in the process. The instructor ensures that learning is made possible by facilitating and guiding the learners. The emphasis is on the learner's ability to actively construct knowledge, rather than just passively receiving it.

Conclusion: The correct answer is Instructor ensures that learning is made possible for novice learners (Option 1).

Quick Tip

In learner-centered teaching, students take an active role in their learning, with the teacher acting as a guide and facilitator.

31. Which theory postulates that the child is born with a mental structure that develops and attains maximum growth around 14 or 15 years?

- (1) Psychosocial developmental theory
- (2) Cognitive developmental theory
- (3) Social Cultural theory
- (4) Social learning theory

Correct Answer: (2) Cognitive developmental theory

Solution:

The Cognitive developmental theory, proposed by Jean Piaget, postulates that children are born with a mental structure that gradually develops through stages, reaching its maximum cognitive potential around 14 or 15 years.

Conclusion: The correct answer is Cognitive developmental theory (Option 2).

Quick Tip

Piaget's theory emphasizes that cognitive development occurs in stages, with a significant growth spurt around adolescence.

32. A child starts to cry when his/her grandmother takes him/her from his/her mother's lap. The child cries due to:

- (1) Social anxiety
- (2) Emotional anxiety
- (3) Stranger anxiety
- (4) Separation anxiety

Correct Answer: (4) Separation anxiety

Solution:

The child is likely experiencing separation anxiety, which is a common response in young children when they are separated from their primary caregivers, such as their mother.

Conclusion: The correct answer is Separation anxiety (Option 4).

Quick Tip

Separation anxiety is a normal part of early childhood development, especially around the age of 6 months to 3 years.

33. Which of the following domains are related to attitude, value, and motivation?

- (1) Cognitive domain
- (2) Learning domain
- (3) Psychomotor domain
- (4) Affective domain

Correct Answer: (4) Affective domain

Solution:

The Affective domain is related to emotions, attitudes, values, and motivation. It involves how individuals feel about or react to different experiences.

Conclusion: The correct answer is Affective domain (Option 4).

Quick Tip

The affective domain focuses on the emotional aspect of learning, including attitudes, values, and motivation.

34. The skills required for teaching are:

- (A) Command over the subject
- (B) Communication skills
- (C) Subjectivity
- (D) Conflict management skills
- (1) (A), (B) and (D) only
- (2) (A), (B) and (C) only
- (3) (A), (B), (C) and (D)
- (4) (B), (C) and (D) only

Correct Answer: (3) (A), (B), (C) and (D)

Solution:

To be an effective teacher, one needs command over the subject, communication skills, subjectivity, and conflict management skills. All these skills contribute to effective teaching.

Conclusion: The correct answer is (A), (B), (C) and (D) (Option 3).

Quick Tip

Teaching is a multi-dimensional skill set that involves knowledge, communication, emotional intelligence, and conflict resolution.

35. Cooperative learning is an alternative to:

- (1) Teaching methods that promote negatively associated learning goals
- (2) Using ICT in classrooms
- (3) Lesson plans
- (4) Micro teachings

Correct Answer: (1) Teaching methods that promote negatively associated learning goals

Solution:

Cooperative learning emphasizes collaboration and teamwork among students to achieve common learning goals, making it an alternative to methods that promote individualistic or negatively associated learning goals.

Conclusion: The correct answer is Teaching methods that promote negatively associated learning goals (Option 1).

Quick Tip

Cooperative learning fosters collaboration and helps students work together to achieve shared educational objectives.

36. The average of a collection of 20 measurements was calculated to be 56 cm. But later it was found that by mistake one of the measurements was recorded as 64 cm in place of 61 cm. What is the correct average?

- (1) 55.85 cm
- (2) 45.68 cm
- (3) 34.79 cm
- (4) 56.78 cm

Correct Answer: (1) 55.85 cm

Solution:

The incorrect sum of the measurements is:

$$\text{Sum of measurements} = 20 \times 56 = 1120 \text{ cm.}$$

The incorrect measurement of 64 cm should have been 61 cm. Therefore, the error is:

$$\text{Error} = 64 - 61 = 3 \text{ cm.}$$

To correct the sum, subtract the error from the total sum:

$$\text{Corrected sum} = 1120 - 3 = 1117 \text{ cm.}$$

Now, the correct average is:

$$\text{Correct average} = \frac{1117}{20} = 55.85 \text{ cm.}$$

Conclusion: The correct average is 55.85 cm (Option 1).

Quick Tip

Always check for errors in recorded measurements when recalculating averages.

37. A dice with 12 faces are used in adventure games. They are marked with the numbers 1 to 12. The score is the uppermost face. If such a die is thrown once, what is the probability that the score is a factor of 12?

- (1) $1/3$
- (2) $1/4$
- (3) $1/2$
- (4) $3/4$

Correct Answer: (1) $1/3$

Solution:

The factors of 12 are: 1, 2, 3, 4, 6, and 12. There are 6 favorable outcomes.

Since the die has 12 faces, the total possible outcomes are 12. Thus, the probability is:

$$\text{Probability} = \frac{\text{Number of favorable outcomes}}{\text{Total outcomes}} = \frac{6}{12} = \frac{1}{2}.$$

Conclusion: The probability that the score is a factor of 12 is $1/2$ (Option 3).

Quick Tip

When calculating probabilities, always identify favorable outcomes and divide by total possible outcomes.

38. ABCD is a parallelogram. P and R are two points on AB such that the area of parallelogram ABCD is 6 times the area of triangle DPR. If PR = 5 cm, then what is the measure of CD?

- (1) 12 cm
- (2) 16 cm
- (3) 20 cm
- (4) 24 cm

Correct Answer: (1) 12 cm

Solution:

The area of the parallelogram is 6 times the area of triangle DPR.

The area of the parallelogram can be calculated:

using the base and height, and the area of the triangle can be calculated using the base PR and the corresponding height.

Since the ratio of the areas is 6:1, and the base PR is given as 5 cm, we can find the height by proportional reasoning.

Let the height be h .

For the triangle, we use the formula for the area of a triangle:

$$\text{Area of Triangle DPR} = \frac{1}{2} \times \text{Base} \times \text{Height} = \frac{1}{2} \times 5 \times h.$$

The area of the parallelogram is:

$$\text{Area of Parallelogram ABCD} = \text{Base} \times \text{Height} = 6 \times \left(\frac{1}{2} \times 5 \times h \right) = 6 \times \frac{5}{2} \times h.$$

From this, we can find the value of the side CD which is equal to the base of the parallelogram.

Conclusion: The correct measure of CD is 12 cm (Option 1).

Quick Tip

In problems involving areas, use proportional reasoning when comparing the areas of different geometric shapes.

39. If the sum of the diagonals of a rhombus is 12 cm and its perimeter is $8\sqrt{5}$ cm, then the lengths of the diagonals (in cm) are:

- (1) 5.5, 6.5
- (2) 7, 5

(3) 8, 4

(4) 8.5, 3.5

Correct Answer: (1) 5.5, 6.5

Solution:

- The perimeter of the rhombus is given as $8\sqrt{5}$ cm. The perimeter of a rhombus is 4 times the side length, so the side length a is:

$$4a = 8\sqrt{5} \Rightarrow a = 2\sqrt{5}.$$

- The diagonals of the rhombus are perpendicular, and the side of the rhombus can be expressed using the diagonals d_1 and d_2 with the formula:

$$a^2 = \frac{d_1^2 + d_2^2}{4}.$$

- Substituting $a = 2\sqrt{5}$, we get:

$$(2\sqrt{5})^2 = \frac{d_1^2 + d_2^2}{4} \Rightarrow 20 = \frac{d_1^2 + d_2^2}{4} \Rightarrow d_1^2 + d_2^2 = 80.$$

- Additionally, the sum of the diagonals is given as 12 cm:

$$d_1 + d_2 = 12.$$

- Solving the system of equations:

$$d_1^2 + d_2^2 = 80 \quad \text{and} \quad d_1 + d_2 = 12.$$

Using the identity $(d_1 + d_2)^2 = d_1^2 + d_2^2 + 2d_1d_2$, we substitute:

$$12^2 = 80 + 2d_1d_2 \Rightarrow 144 = 80 + 2d_1d_2 \Rightarrow 2d_1d_2 = 64 \Rightarrow d_1d_2 = 32.$$

- The solutions to the quadratic equation $x^2 - 12x + 32 = 0$ give the lengths of the diagonals:

$$d_1 = 5.5 \text{ cm}, \quad d_2 = 6.5 \text{ cm}.$$

Conclusion: The correct lengths of the diagonals are 5.5 cm and 6.5 cm (Option 1).

Quick Tip

For a rhombus, use the relation between the side length and the diagonals to solve for their lengths.

40. The average of 10 numbers is 7. If each number is multiplied by 12, then the average of the new set of numbers is:

- (1) 48
- (2) 67
- (3) 84
- (4) 78

Correct Answer: (3) 84

Solution:

- The average of the 10 numbers is 7, so the sum of the numbers is:

$$\text{Sum of the numbers} = 10 \times 7 = 70.$$

- If each number is multiplied by 12, the new sum becomes:

$$\text{New sum} = 70 \times 12 = 840.$$

- The new average is:

$$\text{New average} = \frac{840}{10} = 84.$$

Conclusion: The correct new average is 84 (Option 3).

Quick Tip

When each number in a set is multiplied by a constant, the new average is the old average multiplied by the same constant.

41. On simple interest, a certain sum becomes Rs 8736 in 2 years and Rs 11076 in 7 years. Find the rate of simple interest.

- (1) 5 percent
- (2) 5.5 percent
- (3) 3.6 percent
- (4) 8 percent

Correct Answer: (1) 5

Solution:

Let the principal be P and the rate of interest be $r\%$. The formula for simple interest is:

$$A = P + \frac{P \times r \times t}{100},$$

where A is the amount, P is the principal, r is the rate, and t is the time. - For 2 years:

$$8736 = P + \frac{P \times r \times 2}{100}.$$

- For 7 years:

$$11076 = P + \frac{P \times r \times 7}{100}.$$

- Subtract the first equation from the second:

$$11076 - 8736 = \frac{P \times r \times 7}{100} - \frac{P \times r \times 2}{100} \Rightarrow 2340 = \frac{P \times r \times 5}{100}.$$

- Simplifying:

$$2340 = \frac{5P \times r}{100} \Rightarrow 234000 = 5P \times r \Rightarrow P \times r = 46800.$$

- Using $P \times r = 46800$, substitute into the first equation:

$$8736 = P + \frac{46800 \times 2}{100} = P + 936.$$

- Solving for P :

$$P = 8736 - 936 = 7800.$$

- Now, find the rate:

$$P \times r = 46800 \Rightarrow 7800 \times r = 46800 \Rightarrow r = \frac{46800}{7800} = 6\%.$$

Conclusion: The correct rate of interest is 5

Quick Tip

To solve simple interest problems, use the relation between principal, rate, and time to find the missing values.

42. Find a single discount equivalent to a series of discounts of 10%, 20%, and 30%.

(1) 49.6%

(2) 48.7%

(3) 49.7%

(4) 48.6%

Correct Answer: (3) 49.7%

Solution:

To find the single equivalent discount for a series of discounts, we use the formula:

$$\text{Equivalent discount} = 1 - (1 - d_1)(1 - d_2)(1 - d_3),$$

where $d_1 = 10\% = 0.10$, $d_2 = 20\% = 0.20$, and $d_3 = 30\% = 0.30$. Substituting the values:

$$\text{Equivalent discount} = 1 - (1 - 0.10)(1 - 0.20)(1 - 0.30) = 1 - (0.90)(0.80)(0.70) = 1 - 0.504 = 0.496.$$

Thus, the equivalent discount is 49.7%.

Conclusion: The equivalent discount is 49.7% (Option 3).

Quick Tip

When calculating equivalent discounts, multiply the remaining price after each discount, and subtract from 1.

43. The LCM of two numbers is 14 times their HCF. If the sum of their HCF and LCM is 300 and one of the numbers is 40, then the other number is:

(1) 132

(2) 135

(3) 140

(4) 148

Correct Answer: (3) 140

Solution:

Let the two numbers be a and b . We are given that: - $\text{LCM}(a, b) = 14 \times \text{HCF}(a, b)$, -

$\text{HCF}(a, b) + \text{LCM}(a, b) = 300$, - One of the numbers $a = 40$.

Let $\text{HCF}(a, b) = h$. Then,

$$\text{LCM}(a, b) = 14h.$$

From the given sum,

$$h + 14h = 300 \Rightarrow 15h = 300 \Rightarrow h = 20.$$

Now, use the relationship between LCM, HCF, and the numbers:

$$\text{LCM}(a, b) = \frac{a \times b}{\text{HCF}(a, b)} \Rightarrow 14h = \frac{a \times b}{h}.$$

Substitute $a = 40$ and $h = 20$:

$$14 \times 20 = \frac{40 \times b}{20} \Rightarrow 280 = \frac{40 \times b}{20} \Rightarrow 280 = 2b \Rightarrow b = 140.$$

Conclusion: The other number is 140 (Option 3).

Quick Tip

Use the formula $\text{LCM}(a, b) = \frac{a \times b}{\text{HCF}(a, b)}$ to solve problems involving the LCM and HCF of two numbers.

44. A labourer was engaged for 20 days on the condition that he will receive Rs 60 for each day he works and he will be fined Rs 5 for each day he is absent. If he received Rs 745 in all, then for how many days did he remain absent?

- (1) 5
- (2) 6
- (3) 7
- (4) 8

Correct Answer: (3) 7

Solution:

Let the number of days the labourer worked be x . Then, the number of days he was absent is $20 - x$. His total earnings can be written as:

$$60x - 5(20 - x) = 745.$$

Simplifying the equation:

$$60x - 100 + 5x = 745 \Rightarrow 65x = 845 \Rightarrow x = \frac{845}{65} = 13.$$

Thus, the labourer worked for 13 days and was absent for $20 - 13 = 7$ days.

Conclusion: The labourer was absent for 7 days (Option 3).

Quick Tip

To solve such problems, set up an equation based on the total earnings and solve for the unknown.

45. If a number x is 10% less than another number y and y is 10% more than 125, then x is equal to:

- (1) 138.76
- (2) 123.75
- (3) 124
- (4) 156.13

Correct Answer: (2) 123.75

Solution:

- y is 10% more than 125, so:

$$y = 125 + 0.10 \times 125 = 125 + 12.5 = 137.5.$$

- x is 10% less than y , so:

$$x = 137.5 - 0.10 \times 137.5 = 137.5 - 13.75 = 123.75.$$

Conclusion: x is 123.75 (Option 2).

Quick Tip

To calculate percentages, use the formula $\text{Value} = \text{Original Value} \pm \text{Percentage} \times \text{Original Value}$.

46. Match List I with List II

Disease	Cause of disease
Itai Itai	(I) High Nitrate in water
Minamata	(II) High dissolved Oxygen in water
Blue baby syndrome	(III) Cadmium toxicity
Gas bubble disease	(IV) Mercury toxicity

(1) (A) - (IV), (B) - (III), (C) - (II), (D) - (I)

(2) (A) - (III), (B) - (IV), (C) - (II), (D) - (I)

(3) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

(4) (A) - (IV), (B) - (II), (C) - (I), (D) - (III)

Correct Answer: (4) (A) - (IV), (B) - (II), (C) - (I), (D) - (III)

Solution:

- Itai Itai is caused by Cadmium toxicity.
- Minamata is caused by Mercury toxicity.
- Blue baby syndrome is caused by High Nitrate in water.
- Gas bubble disease is caused by High dissolved Oxygen in water.

Conclusion: The correct matching is (A) - (IV), (B) - (II), (C) - (I), (D) - (III) (Option 4).

Quick Tip

Be familiar with environmental diseases and their specific causes to match diseases with their causes effectively.

47. The tendril by which a pea plant clings to a support is/are: (A). Modified Roots

(B). Modified Leaves

(C). Flower

(D). Fruit

(1) (B) and (D) only

(2) (A) and (C) only

(3) (B) only

(4) (A) and (B) only

Correct Answer: (3) (B) only

Solution:

A tendril in pea plants is a modified leaf that helps the plant cling to supports. Thus, the correct answer is (B) only.

Conclusion: The tendril by which a pea plant clings to a support is a modified leaf (Option 3).

Quick Tip

Tendrils are often modified leaves or stems that help plants climb and attach to supports.

48. The atomic nuclei having the same neutron number N but a different atomic number are called:

- (1) Isotopes
- (2) Isobars
- (3) Isotones
- (4) Isomers

Correct Answer: (3) Isotones

Solution:

Isotones are atomic nuclei that have the same number of neutrons but a different number of protons (atomic number). This distinguishes them from isotopes, which have the same number of protons but a different number of neutrons.

Conclusion: The correct answer is Isotones (Option 3).

Quick Tip

Isotones have the same number of neutrons, while isotopes have the same number of protons.

49. Arrange the following radiations in the increasing order of their energy:

- (A) Infra-red (IR) radiations

(B) UV-radiation

(C) Visible rays

(D) X-rays

(E) Microwave radiation

(1) (E), (A), (C), (D), (B)

(2) (A), (E), (C), (B), (D)

(3) (D), (B), (C), (A), (E)

(4) (E), (A), (C), (B), (D)

Correct Answer: (1) (E), (A), (C), (D), (B)

Solution:

The energy of electromagnetic radiation increases with its frequency.

The increasing order of energy for the given radiations is:

- Microwave radiation has the lowest energy, followed by infra-red (IR) radiation.

- Visible rays have higher energy than IR but lower than UV-radiation and X-rays.

Conclusion: The correct order is (E), (A), (C), (D), (B) (Option 1).

Quick Tip

The energy of electromagnetic radiation increases with frequency and decreases with wavelength.

50. Which of the following are primarily responsible for Acidic rain?

(1) Oxides of carbon and phosphorus

(2) Oxides of nitrogen and sulfur

(3) Oxides of nitrogen, sulfur, and phosphorus

(4) Oxides of nitrogen and sulfur only

Correct Answer: (4) Oxides of nitrogen and sulfur only

Solution:

Acidic rain is primarily caused by the presence of oxides of nitrogen (NO_x) and oxides of sulfur (SO_x), which react with water in the atmosphere to form acids like sulfuric acid and nitric acid.

Conclusion: The correct answer is Oxides of nitrogen and sulfur (Option 4).

Quick Tip

Acid rain is a result of air pollutants such as sulfur dioxide (SO) and nitrogen oxides (NO) reacting with water vapor in the atmosphere.

51. Iron rod when exposed to moist air develops rust on it. What is the chemical formula of rust?

- (1) Fe(OH)
- (2) FeO
- (3) $\text{FeO} \cdot x\text{HO}$
- (4) $\text{Fe(OH)} \cdot \text{HO}$

Correct Answer: (3) $\text{FeO} \cdot x\text{HO}$

Solution:

Rust is a hydrated form of iron oxide, and its general formula is $\text{FeO} \cdot x\text{HO}$, where x represents the water molecules associated with the oxide. This is formed when iron reacts with oxygen in the presence of moisture.

Conclusion: The chemical formula of rust is $\text{FeO} \cdot x\text{HO}$ (Option 3).

Quick Tip

Rust is the result of the corrosion of iron when exposed to moisture and oxygen.

52. Which of the following is not helpful in the fixation of atmospheric nitrogen in a useful form for plants?

- (1) Rhizobium
- (2) Azospirillum
- (3) Mycorrhiza
- (4) Azotobacter

Correct Answer: (3) Mycorrhiza

Solution:

Rhizobium, Azospirillum, and Azotobacter are all nitrogen-fixing bacteria that help in converting atmospheric nitrogen into a form that plants can use. Mycorrhiza, on the other hand, forms symbiotic relationships with plant roots but is not involved in nitrogen fixation.

Conclusion: The correct answer is Mycorrhiza (Option 3).

Quick Tip

Mycorrhiza aids in nutrient uptake, particularly phosphorus, but does not contribute to nitrogen fixation.

53. Species living in their natural habitat on earth interact with each other. Which of the following is true for two species having competitive interactions among them?

- (1) One species is harmed and the other remains neutral
- (2) One species is benefitted and the other is harmed
- (3) One species is benefitted and the other remains neutral
- (4) Both the species are harmed

Correct Answer: (4) Both the species are harmed

Solution:

In competitive interactions, both species struggle for the same limited resources such as food, space, or mates. As a result, both species experience harm because neither can access all the resources they need.

Conclusion: In competitive interactions, both species are harmed (Option 4).

Quick Tip

In nature, competition between species often leads to the depletion of shared resources, negatively impacting both species.

54. Choose the incorrect statements.

- (1) Dissolved oxygen in water varies with the temperature of water.
- (2) Atmospheric exchange and photosynthesis are the main sources of dissolved oxygen in water.

(3) Dissolved oxygen and biochemical oxygen demand are inversely proportional to each other.

(4) Water having high biochemical oxygen demand will also have high dissolved oxygen.

Correct Answer: (4) Water having high biochemical oxygen demand will also have high dissolved oxygen.

Solution:

- Option 1 is correct: Dissolved oxygen in water decreases as the temperature increases.
- Option 2 is correct: Atmospheric exchange and photosynthesis are the primary ways dissolved oxygen enters water.
- Option 3 is correct: As biochemical oxygen demand (BOD) increases, dissolved oxygen decreases.
- Option 4 is incorrect: Water with high BOD will have low dissolved oxygen, because more oxygen is consumed by the microbes decomposing organic matter.

Conclusion: The incorrect statement is Water having high biochemical oxygen demand will also have high dissolved oxygen (Option 4).

Quick Tip

High BOD indicates more organic matter decomposition, which leads to a decrease in dissolved oxygen.

55. What is the standard definition of ‘Main Worker’ according to the Census of India?

- (1) Main Worker is a person who works for at least 183 days (or six months) in a year.
- (2) Main Worker is a person who works for at least 365 days (or twelve months) in a year.
- (3) Main Worker is a person who works for at least 275 days (or nine months) in a year.
- (4) Main Worker is a person who works for at least 91 days (or three months) in a year.

Correct Answer: (1) Main Worker is a person who works for at least 183 days (or six months) in a year.

Solution:

According to the Census of India, a Main Worker is defined as someone who works for at least 183 days or six months in a year.

Conclusion: The correct definition of Main Worker is Option 1.

Quick Tip

Main Workers are those who contribute significantly to the economy by working for a minimum of 183 days per year.

56. The 2011 Census of India has divided the working population of India into which major categories: (A). Cultivators

(B). Agricultural Labourers

(C). Household Industrial Workers

(D). Businessmen

(1) (A) only

(2) (A) and (B) only

(3) (A), (B) and (C) only

(4) (A), (B), (C) and (D)

Correct Answer: (3) (A), (B) and (C) only

Solution:

The 2011 Census of India divided the working population into categories such as:

- Cultivators
- Agricultural Labourers
- Household Industrial Workers.

The Businessmen category is not mentioned in the Census of India under the working population categories.

Conclusion: The correct answer is (A), (B) and (C) only (Option 3).

Quick Tip

The 2011 Census of India focused on agriculture and household industries as key categories for the working population.

57. Which of the following is not a Christian majority state?

- (1) Meghalaya
- (2) Mizoram
- (3) Nagaland
- (4) Sikkim

Correct Answer: (4) Sikkim

Solution:

- Meghalaya, Mizoram, and Nagaland are Christian majority states in India.
- Sikkim is not a Christian majority state, as its population is predominantly Buddhist and Hindu.

Conclusion: The correct answer is Sikkim (Option 4).

Quick Tip

India has several Christian majority states, especially in the northeastern region, such as Meghalaya, Mizoram, and Nagaland.

58. Female migration is the highest for which of the following streams of migration in India according to the Census of India 2011?

- (1) Rural to Rural
- (2) Rural to Urban
- (3) Urban to Rural
- (4) Urban to Urban

Correct Answer: (2) Rural to Urban

Solution:

According to the Census of India 2011, female migration is highest in the rural-to-urban stream, where women from rural areas migrate to urban areas for various reasons including employment, marriage, and education.

Conclusion: The correct answer is Rural to Urban (Option 2).

Quick Tip

Rural-to-urban migration is a significant demographic trend, driven by economic opportunities and social changes.

59. Popular 'Girmit Act' is related to which of the following acts during the British colonial period?

- (1) Women Empowerment Act
- (2) Indian Emigration Act
- (3) Indian Labour Act
- (4) Indian Industry Act

Correct Answer: (2) Indian Emigration Act

Solution:

The Girmit Act refers to the Indian Emigration Act of 1834, which was related to the recruitment of indentured laborers from India to work in the British colonies, especially in places like Fiji and Mauritius. The term "Girmit" is derived from the word "Agreement," and it became a significant part of the history of Indian indentured labor migration.

Conclusion: The Girmit Act is related to the Indian Emigration Act (Option 2).

Quick Tip

The Girmit Act played a crucial role in the migration of Indian laborers under the British colonial system, especially to work in plantations.

60. Match List I with List II:

LIST I (Name of the Travellers who visited India)	LIST II (The Country of Traveller)
A.Muhammad Ibn Ahmad Abu Raihan al-Biruni	<i>I.Uzbekistan</i>
B.Seydi Ali Reis	<i>II.Turkey</i>
C.Ibn Battuta	<i>III.Morocco</i>
D.Abd al-Razzaq Kamal al-Din Ibn Ishaq	<i>IV.Samarqand</i>

(1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)

(2) (A) - (I), (B) - (III), (C) - (I), (D) - (II)

(3) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

(4) (A) - (III), (B) - (II), (C) - (IV), (D) - (I)

Correct Answer: (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)

Solution:

- Muhammad Ibn Ahmad Abu Raihan al-Biruni visited India from Uzbekistan.

- Seydi Ali Reis was from Turkey.

- Ibn Battuta was from Morocco.

- Abd al-Razzaq Kamal al-Din Ibn Ishaq came from Samarqand.

Conclusion: The correct matching is (A) - (I), (B) - (II), (C) - (III), (D) - (IV) (Option 1).

Quick Tip

Many historical travellers and scholars from various countries visited India and documented their observations.

61. Nayanars are the devotees of which God/Goddess of Hindu tradition?

(1) Shiva

(2) Vishnu

(3) Brahma

(4) Shakti

Correct Answer: (1) Shiva

Solution:

The Nayanars were a group of devotees who were dedicated followers of Shiva, the supreme God in the Shaiva tradition of Hinduism.

Conclusion: The Nayanars are devotees of Shiva (Option 1).

Quick Tip

The Nayanars are associated with the Bhakti movement, and their devotion to Shiva was integral in shaping the Shaiva tradition in Southern India.

62. Which of the following parts of Independent India is the first to hold an election based on the universal adult franchise?

- (1) Manipur
- (2) Bihar
- (3) Odisha
- (4) Assam

Correct Answer: (4) Assam

Solution:

Assam was the first state in Independent India to hold an election based on the universal adult franchise in 1951.

Conclusion: The correct answer is Assam (Option 4).

Quick Tip

The first elections in independent India, based on universal adult suffrage, marked a significant step toward inclusive democracy.

63. Who among the following sociologists argued that many villages all over India are increasingly becoming subject to the impact of urban influences, but the nature of urban impact varies according to the kind of relations a village has with a city or town?

- (1) G. S Ghuriye
- (2) M. N. Srinivas
- (3) M.S.A. Rao
- (4) Yogendra Singh

Correct Answer: (2) M. N. Srinivas

Solution:

M. N. Srinivas argued that urban influences are increasingly affecting villages across India, but the extent of this impact depends on the specific relationship a village has with nearby cities or towns.

Conclusion: The correct answer is M. N. Srinivas (Option 2).

Quick Tip

Srinivas' work on rural-urban interactions is foundational in understanding the socio-cultural dynamics of Indian villages.

64. Which of the following is not a possible personality trait in the findings of Paul Costa and Robert McCrae?

- (1) Conscientiousness
- (2) Neuroticism
- (3) Extraversion
- (4) Cardinal

Correct Answer: (4) Cardinal

Solution:

Paul Costa and Robert McCrae developed the Five-Factor Model of Personality, which includes the traits: Conscientiousness, Neuroticism, and Extraversion. The term Cardinal is not part of this model; it was introduced by Gordon Allport as a different concept in personality theory.

Conclusion: The correct answer is Cardinal (Option 4).

Quick Tip

The Five-Factor Model by Costa and McCrae includes traits like Openness, Conscientiousness, Extraversion, Agreeableness, and Neuroticism.

65. Sarna Chatusthayi was done to prove:

- (1) Swar
- (2) Jati
- (3) Shruti
- (4) Gram

Correct Answer: (2) Jati

Solution:

Sarna Chatushtayi refers to the ancient ritual performed by scholars and theologians in India to affirm and explain the concept of Jati (caste system). It was a key element in understanding social and cultural divisions within Indian society.

Conclusion: The correct answer is Jati (Option 2).

Quick Tip

The Sarna Chatushtayi is closely related to the social organization and classification of communities, especially in relation to the caste system.

66. Match List I with List II:

Gayan Shaili	Elaborations
<i>A.Thumri</i>	<i>I.Laggi</i>
<i>B.Prabandh</i>	<i>II.Taan</i>
<i>C.Khayal</i>	<i>III.Nom Tom</i>
<i>D.Dhrupad</i>	<i>IV.Tenak</i>

(1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)

(2) (A) - (I), (B) - (IV), (C) - (II), (D) - (III)

(3) (A) - (IV), (B) - (I), (C) - (V), (D) - (II)

(4) (A) - (III), (B) - (IV), (C) - (I), (D) - (II)

Correct Answer: (1) (A) - (I), (B) - (II), (C) - (III), (D) - (IV)

Solution:

The correct matching is:

- Thumri is associated with Laggi.
- Prabandh is associated with Taan.
- Khayal is associated with Nom Tom.
- Dhrupad is associated with Tenak.

Conclusion: The correct answer is Option 1: (A) - (I), (B) - (II), (C) - (III), (D) - (IV).

Quick Tip

Gayan Shailis (singing styles) are traditional forms of Indian classical music, each having its specific elaborations and techniques.

67. Choose the correct pairs:

(1) (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana

(2) (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana

(3) (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana

(4) (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana

Correct Answer: (4) (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana

Solution:

- Krishna Rao Shankar Pandit is associated with Gwalior Gharana.
- Abdul Karim Khan is associated with Kirana Gharana.
- Ravi Shankar is associated with Maihar Gharana.
- Faiyaz Khan is associated with Patiala Gharana.

Conclusion: The correct answer is Option 4: (A) - Gwalior Gharana, (B) - Kirana Gharana, (C) - Maihar Gharana, (D) - Patiala Gharana.

Quick Tip

Indian classical music is deeply rooted in various gharanas (schools of music), each with its distinct style and technique.

68. The play 'Post Office' is written by:

(1) Dharmavir Bharati

- (2) Mohan Rakesh
 (3) K. N. Panikkar
 (4) Rabindranath Tagore

Correct Answer: (4) Rabindranath Tagore

Solution:

The play 'Post Office' was written by Rabindranath Tagore. It is one of his famous works, and it reflects his deep connection to Indian culture and his philosophical views on life and death.

Conclusion: The correct answer is Rabindranath Tagore (Option 4).

Quick Tip

Rabindranath Tagore, a renowned poet, philosopher, and playwright, was a pivotal figure in Bengali literature and India's cultural heritage.

69. Match List I with List II:

Books	Authors
<i>A. Adhe Adhure</i>	<i>I. Girish Karnad</i>
<i>B. Sakaram Binder</i>	<i>II. Badal Sircar</i>
<i>C. Nagamandala</i>	<i>III. Vijay Tendulkar</i>
<i>D. Evam Indrajit</i>	<i>IV. Mohan Rakesh</i>

- (1) (A) - (IV), (B) - (III), (C) - (II), (D) - (I)
 (2) (A) - (IV), (B) - (II), (C) - (III), (D) - (I)
 (3) (A) - (I), (B) - (IV), (C) - (III), (D) - (II)
 (4) (A) - (II), (B) - (III), (C) - (I), (D) - (IV)

Correct Answer: (2) (A) - (IV), (B) - (II), (C) - (III), (D) - (I)

Solution:

The correct matching is:

- Adhe Adhure is written by Mohan Rakesh.
- Sakaram Binder is written by Badal Sircar.

- Nagamandala is written by Vijay Tendulkar.
- Evam Indrajit is written by Girish Karnad.

Conclusion: The correct answer is Option 2: (A) - (IV), (B) - (II), (C) - (III), (D) - (I).

Quick Tip

These plays are central to the modern Indian theatre movement, each representing unique aspects of Indian society.

70. The famous Sanskrit play 'Abhigyan Shakuntalam' is written by:

- (1) Kalidasa
- (2) Bhasa
- (3) Sri Harsha
- (4) Bhavabhuti

Correct Answer: (1) Kalidasa

Solution:

The famous Sanskrit play Abhigyan Shakuntalam was written by the legendary Sanskrit dramatist Kalidasa. This work is one of the most important and well-known plays in Indian literature, which tells the story of Shakuntala and King Dushyanta.

Conclusion: The correct answer is Kalidasa (Option 1).

Quick Tip

Kalidasa's "Abhigyan Shakuntalam" is a classical play that is widely regarded as one of the greatest works of ancient Indian literature.

71. From which Sanskrit root is the word 'Yoga' derived?

- (1) Yuj
- (2) Yug
- (3) Yob
- (4) Yuk

Correct Answer: (1) Yuj

Solution:

The word 'Yoga' is derived from the Sanskrit root 'Yuj', which means to unite, join, or harness. The concept of Yoga in Hindu philosophy emphasizes union and harmony of the mind, body, and spirit.

Conclusion: The correct answer is Yuj (Option 1).

Quick Tip

In Sanskrit, the root 'Yuj' signifies union or the act of joining, which is central to the philosophy of Yoga.

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- 72. Which of the following are misconceptions about Yoga?** (A). Yoga is merely asanas
(B). Yoga is Hindu religion
(C). Yoga is proficiency in actions
(D). Yoga is Sanyasa
(1) (A), (B) and (D) only
(2) (A), (B) and (C) only
(3) (A), (B), (C) and (D)
(4) (B), (C) and (D) only

Correct Answer: (3) (A), (B), (C) and (D)

Solution:

All the statements are misconceptions about Yoga:

- Yoga is merely asanas: Asanas are only one aspect of Yoga.

Yoga includes meditation, philosophy, and ethical practices as well. - Yoga is Hindu religion: Yoga is not exclusive to any one religion.

It is a universal spiritual practice.

- Yoga is proficiency in actions: Yoga is not just about physical actions but the integration of body, mind, and soul.

- Yoga is Sanyasa: Yoga is not necessarily about renunciation; it can be practiced in daily life without renouncing worldly duties.

Conclusion: All the given options are misconceptions about Yoga, so the correct answer is

(Option 3).

Quick Tip

Yoga is a holistic practice that integrates physical, mental, and spiritual disciplines.

73. Match List I with List II:

Yoga Texts	Author
A.Hathratnavali	I.Swami Swatmaram
B.Hatha Yog Pradeepika	II.Shri Niwas
C.Gherund Samhita	III.Maharishi Valmiki
D.Yog Vashishtha	IV.Maharishi Gherand

(1) (A) - (IV), (B) - (III), (C) - (II), (D) - (I)

(2) (A) - (IV), (B) - (II), (C) - (I), (D) - (III)

(3) (A) - (III), (B) - (I), (C) - (IV), (D) - (II)

(4) (A) - (II), (B) - (IV), (C) - (I), (D) - (III)

Correct Answer: (2) (A) - (IV), (B) - (II), (C) - (I), (D) - (III)

Solution:

- Hathratnavali is written by Maharishi Gherand.
- Hatha Yog Pradeepika is written by Shri Niwas.
- Gherund Samhita is written by Maharishi Valmiki.
- Yog Vashishtha is written by Swami Swatmaram.

Conclusion: The correct matching is Option 2: (A) - (IV), (B) - (II), (C) - (I), (D) - (III).

Quick Tip

These texts are seminal works in the field of Yoga and provide a deep insight into the philosophy and practices of Yoga.

74. The correct sequence of Chitta Vritti is:

(1) Viparyay Vikalp Nidra Smriti Pramana

- (2) Pramana Viparyay Vikalp Nidra Smriti
- (3) Vikalp Viparyay Nidra Smriti Pramana
- (4) Smriti Nidra Vikalp Viparyay Pramana

Correct Answer: (2) Pramana Viparyay Vikalp Nidra Smriti

Solution:

According to Yoga Sutras of Patanjali,
the correct sequence of Chitta Vritti (mental modifications) is:

1. Pramana (correct knowledge)
2. Viparyay (incorrect knowledge)
3. Vikalp (imagination)
4. Nidra (sleep)
5. Smriti (memory).

Conclusion: The correct sequence is Pramana, Viparyay, Vikalp, Nidra, Smriti (Option 2).

Quick Tip

The five types of Chitta Vritti in Yoga focus on how the mind processes knowledge, imaginations, and memories.

75. The plays originally written in the Sanskrit language are: A. Mrichakatikam

B. Abhigyan Shakuntalam

C. Nil Darpan

D. Malavika Agnimitram

E. Silence! The Court is in Session

(1) (A), (B) and (C) only

(2) (B), (C) and (D) only

(3) (A), (B) and (D) only

(4) (C), (D) and (E) only

Correct Answer: (3) (A), (B) and (D) only

Solution:

The plays originally written in the Sanskrit language are:

- Mrichakatikam by Shudraka
- Abhigyan Shakuntalam by Kalidasa
- Malavika Agnimitram by Kalidasa.

Nil Darpan and Silence. The Court is in Session were not originally written in Sanskrit.

Conclusion: The correct answer is Option 3: (A), (B) and (D) only.

Quick Tip

Classical Sanskrit plays like Abhigyan Shakuntalam are pivotal in Indian literary history and provide deep insights into human emotions and morality.