CUET-UG Physical Education Sample Paper-18

Duration: 1 Hour **Maximum Marks: 250**

Instructions

- This paper contains a total of 50 Multiple Choice Questions.
- Each correct answer carries **+5 marks**.
- Each incorrect answer carries **-1 mark**.
- No negative marking for unattempted questions.

Q1. The Government of India launched an important healthcare initiative to improve medical facilities in rural regions and ensure accessible healthcare services for economically weaker sections of society. This mission also focuses on maternal healthcare, child immunization, disease prevention, and strengthening healthcare infrastructure in villages and remote areas. Identify the name of this programme.

(A) Fit India Movement

(B) National Rural Health Mission

(C) Khelo India Programme

(D) POSHAN Abhiyaan

Q2. The Mid-Day Meal Scheme was introduced in schools to improve the nutritional status of children and encourage regular attendance in educational institutions. The programme has played an important role in reducing classroom hunger and increasing enrolment among students from economically disadvantaged backgrounds. What is the primary objective of this scheme?

(A) Development of sports infrastructure

(B) Promotion of yoga activities

(C) Reduction in dropout rate and improvement in nutrition

(D) Selection of talented athletes

Q3. Certain diseases spread from one individual to another through air, water, food, or physical contact. Such diseases require preventive measures like vaccination, sanitation, and public awareness programmes to control their transmission. Tuberculosis is an example of which type of disease?

(A) Lifestyle disease

(B) Deficiency disease

(C) Communicable disease

(D) Genetic disorder

Q4. Psychologists have classified human personalities into different categories based on behavioural traits and attitudes. One such theory categorized individuals as introverts and extroverts according to their social interaction patterns and psychological orientation. Which psychologist proposed this theory?

(A) Sigmund Freud

(B) Carl Jung

(C) Sheldon

(D) Allport

Q5. A player in a Kabaddi match enters the opponent's court with the objective of touching defenders and returning safely to his own side while continuously chanting the word "Kabaddi". What is this player called in the game?

(A) Defender

(B) Striker

(C) Raider

(D) Goalkeeper

Q6. Yoga includes several postures and practices that help improve physical fitness, concentration, balance, and mental well-being. One particular posture resembles the steady and balanced position of a tree and is highly beneficial for improving body balance and concentration. Identify this asana.

(A) Bhujangasana

(B) Vajrasana

(C) Vrikshasana

(D) Tadasana

Q7. Different nutrients perform different functions inside the human body. Some nutrients mainly provide energy, while others help in growth and repair of tissues. Which nutrient is primarily responsible for providing energy required for daily physical activities and sports performance?

(A) Proteins

(B) Vitamins

(C) Carbohydrates

(D) Minerals

Q8. Postural deformities can affect the alignment and movement efficiency of the human body. One such deformity occurs when the knees touch each other while standing straight, causing an inward angulation of the legs. Identify this deformity.

(A) Flat Foot

(B) Knock Knees

(C) Kyphosis

(D) Lordosis

Q9. India honours exceptional athletes and coaches through various national sports awards. The highest sporting honour in the country is awarded to athletes for spectacular and outstanding performances at the international level over a period of years. Identify this award.

(A) Arjuna Award

(B) Dronacharya Award

(C) Major Dhyan Chand Khel Ratna Award

(D) Padma Shri

Q10. Exercise and training methods are classified according to the type of muscular contraction involved. In one particular type of exercise, muscles contract without any visible movement in the joint angle or muscle length. Pushing against an immovable wall is an example of this exercise. Identify it.

(A) Isotonic Exercise

(B) Isometric Exercise

(C) Isokinetic Exercise

(D) Aerobic Exercise

Case Study - I

A school organized a week-long fitness and wellness camp for students to create awareness about healthy living and physical fitness. During the camp, students performed Suryanamaskar every morning under the supervision of trained yoga instructors. The physical education teacher also introduced endurance-building activities through Fartlek training sessions conducted on the playground. One student suffering from flat foot was advised to perform corrective exercises regularly to improve posture and walking pattern. Nutrition experts invited to the camp explained the importance of carbohydrates and proteins in maintaining energy levels and muscle repair. During one practice session, a young participant suffered a partial crack in the bone due to a fall, which was later identified as a Greenstick fracture. Based on the above passage, answer the following question.

Q11. The training method introduced by the physical education teacher to improve endurance through variations in speed and intensity was:

(A) Circuit Training

(B) Fartlek Training

(C) Plyometric Training

(D) Interval Weight Training

Q12. Refer to the case study given above and answer the following question.

The postural deformity in which the arch of the foot becomes flattened and the entire sole touches the ground is known as:

(A) Kyphosis

(B) Lordosis

(C) Flat Foot

(D) Scoliosis

Q13. Refer to the case study given above and answer the following question.

The type of fracture commonly found in children where the bone bends and cracks partially without breaking completely is called:

(A) Oblique Fracture

(B) Compound Fracture

(C) Greenstick Fracture

(D) Comminuted Fracture

Q14. Refer to the case study given above and answer the following question.

During the nutrition awareness session, students were informed that certain nutrients are essential for growth, repair of body tissues, and recovery after physical activity. Which nutrient mainly performs this body-building and tissue-repairing function?

(A) Carbohydrates

(B) Proteins

(C) Fats

(D) Vitamins

Q15. Refer to the case study given above and answer the following question.

The yoga practice performed every morning during the fitness camp consists of a sequence of twelve postures performed in a rhythmic manner along with controlled breathing. Identify this yogic practice.

(A) Kapalbhati

(B) Anulom Vilom

(C) Suryanamaskar

(D) Vajrasana

Case Study - II

A football coach was preparing his team for an inter-school championship and closely observed the behaviour and performance of players during practice sessions. He noticed that a few players became overly aggressive during competitive situations, which sometimes affected team coordination and discipline. To improve their confidence and performance, the coach used different motivational techniques such as appreciation, rewards, and positive feedback. Agility drills including shuttle runs were regularly conducted to improve quick movement and directional changes among players. One player with a muscular and athletic body structure was identified as a mesomorph according to Sheldon's personality classification theory. While teaching kicking techniques and ball movement, the coach also explained Newton's Laws of Motion and their application in sports activities. Based on the above passage, answer the following question.

Q16. The physical fitness test used by the coach to improve quick directional movement and agility among players was:

(A) Flamingo Balance Test

(B) Shuttle Run Test

(C) Cooper Test

(D) Harvard Step Test

Q17. Refer to the case study given above and answer the following question.

According to Sheldon's body type classification theory, an individual having a muscular, athletic, and well-built physique is categorized as:

(A) Endomorph

(B) Ectomorph

(C) Mesomorph

(D) Introvert

Q18. Refer to the case study given above and answer the following question.

The type of aggression that is controlled within the rules and regulations of sports competition and is used strategically to achieve performance goals is known as:

(A) Hostile Aggression

(B) Instrumental Aggression

(C) Violent Behaviour

(D) Emotional Instability

Q19. Refer to the case study given above and answer the following question.

While explaining kicking techniques in football, the coach referred to Newton's First Law of Motion, which is also known as the Law of:

(A) Gravitation

(B) Inertia

(C) Acceleration

(D) Momentum

Q20. Refer to the case study given above and answer the following question.

The motivational techniques used by the coach in the form of rewards, appreciation, and praise are examples of:

(A) Intrinsic Motivation

(B) Extrinsic Motivation

(C) Anxiety Management

(D) Aggressive Behaviour

Q21. The game of hockey requires players to possess various technical skills such as passing, dribbling, hitting, and tackling in order to maintain possession and create scoring opportunities. Which fundamental skill in hockey is primarily used to move the ball forward while maintaining close control over it?

(A) Blocking

(B) Dribbling

(C) Smashing

(D) Heading

Q22. The standard dimensions and measurements of sports fields are important for maintaining fairness and uniformity in competitions conducted at national and international levels. What is the official length of a cricket pitch measured between the two wickets?

(A) 18 Yards

(B) 20 Yards

(C) 22 Yards

(D) 24 Yards

Q23. Various yogic practices are performed to improve respiratory efficiency, concentration, and overall physical and mental well-being. One pranayama technique is specifically known for producing a cooling effect on the body and mind during hot weather conditions. Identify this pranayama.

(A) Bhastrika

(B) Kapalbhati

(C) Sheetali

(D) Ujjayi

Q24. The human body requires different vitamins and minerals in small quantities for maintaining proper growth and functioning. Deficiency of Vitamin D weakens bones and affects proper bone development, especially among children. Which disease is caused due to deficiency of Vitamin D?

(A) Scurvy

(B) Night Blindness

(C) Rickets

(D) Beriberi

Q25. National sports awards are presented to recognize excellence in sports coaching, athletic performance, and contribution to sports development in India. Which award is specifically given to coaches for producing outstanding sportspersons and achieving remarkable results at international competitions?

(A) Arjuna Award

(B) Dronacharya Award

(C) Major Dhyan Chand Khel Ratna Award

(D) Rajiv Gandhi Award

Q26. Physical fitness training methods are designed to improve different components of fitness such as strength, endurance, flexibility, and speed. One particular training method combines continuous running with variations in pace and intensity, allowing athletes to alternate between fast and slow running according to their comfort and training needs. Identify this training method.

(A) Circuit Training

(B) Weight Training

(C) Fartlek Training

(D) Plyometric Training

Q27. Muscular contractions during physical activity can occur in different ways depending on the type of movement being performed. In one type of exercise, the muscle changes its length while producing movement around a joint. Exercises such as lifting and lowering weights are common examples of this category. Identify the type of exercise.

(A) Isometric Exercise

(B) Isotonic Exercise

(C) Isokinetic Exercise

(D) Static Exercise

Q28. Flexibility is an important component of physical fitness and can be improved through different stretching techniques. One advanced stretching method involves alternate contraction and relaxation of muscles with the help of a partner to increase flexibility and range of motion effectively. What is the full form of PNF stretching?

(A) Physical Neuromuscular Function

(B) Progressive Neurological Fitness

(C) Proprioceptive Neuromuscular Facilitation

(D) Passive Neurological Flexibility

Q29. Fitness tests are conducted to evaluate different components of physical fitness among individuals. One specific test requires a person to balance on a narrow beam or surface on one leg for a certain duration and is commonly used to assess body balance. Identify this test.

(A) Shuttle Run Test

(B) Flamingo Balance Test

(C) Harvard Step Test

(D) Cooper Test

Q30. Physical education professionals often use standardized fitness assessment batteries to evaluate the functional fitness of elderly individuals and senior citizens. Which fitness test battery has been specially designed for assessing the physical fitness of senior citizens?

(A) AAHPER Test

(B) Kraus-Weber Test

(C) Rikli and Jones Test

(D) Cooper Endurance Test

Q31. Newton's Laws of Motion play an important role in understanding sports movements and athletic performance. According to Newton's First Law of Motion, an object continues to remain at rest or in uniform motion unless acted upon by an external force. This law is commonly known as the Law of:

(A) Momentum

(B) Gravitation

(C) Inertia

(D) Acceleration

Q32. The concept of levers is widely applied in biomechanics to study movement in the human body. In a third-class lever, the effort is applied between the fulcrum and the load, allowing greater speed and range of motion. Which of the following activities represents a third-class lever in the human body?

(A) Standing on toes

(B) Seesaw movement

(C) Bicep curl at elbow joint

(D) Wheelbarrow movement

Q33. Regular participation in physical activities and exercise produces several beneficial physiological changes in the human body. One of the important long-term effects of exercise on the cardiovascular system is:

(A) Weakening of heart muscles

(B) Reduction in blood circulation

(C) Increase in efficiency of the heart

(D) Decrease in lung capacity

Q34. Children with special needs often require adapted physical education programmes to ensure equal participation and development through sports and physical activities. Which of the following strategies is most suitable for effectively including Children With Special Needs (CWSN) in physical education classes?

(A) Excluding them from physical activities

(B) Providing only theoretical lessons

(C) Using adapted physical activities according to individual needs

(D) Conducting separate examinations only

Q35. Motivation plays a significant role in enhancing sports performance and encouraging athletes to achieve their goals. When a player participates in sports activities mainly for personal satisfaction, enjoyment, and self-interest rather than external rewards, the type of motivation involved is called:

(A) Extrinsic Motivation

(B) Intrinsic Motivation

(C) Negative Motivation

(D) Forced Motivation

Q36. The game of football is played according to standard international rules and measurements to ensure fairness during competitions. What is the shape of the official goal post used in football?

(A) Circular

(B) Triangular

(C) Rectangular

(D) Cylindrical

Q37. Different yogic practices are recommended for improving digestive efficiency and overall health. One particular sitting posture is considered highly beneficial for digestion and can even be practiced after meals. Identify this yoga posture.

(A) Bhujangasana

(B) Vajrasana

(C) Padmasana

(D) Shirshasana

Q38. The human body requires adequate amounts of proteins, carbohydrates, fats, vitamins, minerals, and water for proper growth and maintenance. Which nutrient is mainly responsible for the repair and maintenance of worn-out body tissues?

(A) Carbohydrates

(B) Proteins

(C) Minerals

(D) Vitamins

Q39. Fractures are classified into different categories based on the pattern and severity of bone damage. In one particular type of fracture, the bone breaks diagonally across its length, forming an angular pattern. Identify this type of fracture.

(A) Greenstick Fracture

(B) Oblique Fracture

(C) Compound Fracture

(D) Comminuted Fracture

Q40. Various professional courses are available in the field of physical education and sports sciences for students interested in sports teaching, coaching, and fitness training. Which course is generally pursued after graduation to become a specialist in physical education at an advanced level?

(A) Diploma in Yoga

(B) B.P.Ed

(C) M.P.Ed

(D) Certificate in Fitness Training

Q41. Physical education teachers often use different field tests to evaluate the agility and speed of students participating in sports activities. One commonly used test requires participants to run back and forth rapidly between two parallel lines placed at a fixed distance. This test helps in assessing quick directional movement and coordination. Identify this test.

(A) Cooper Test

(B) Harvard Step Test

(C) Shuttle Run Test

(D) Flamingo Balance Test

Q42. Biomechanics helps in understanding movement patterns and mechanical principles involved in sports performance. In a second-class lever, the load is positioned between the fulcrum and the effort. Which of the following examples represents a second-class lever in the human body?

(A) Bicep Curl

(B) Seesaw

(C) Standing on Toes

(D) Neck Movement

Q43. The Government of India and educational institutions encourage students to participate in physical education and sports through various academic and professional programmes. Which of the following courses is generally pursued immediately after Class 12 for entering the field of physical education professionally?

(A) M.P.Ed

(B) B.P.Ed

(C) Ph.D in Sports Science

(D) Diploma in Physiotherapy

Q44. Observe the following figure carefully and identify the sports skill illustrated below:

The player shown in the figure is moving the ball forward with controlled stick movement while maintaining possession during the game. Identify the fundamental hockey skill being demonstrated.

(A) Tackling

(B) Hitting

(C) Dribbling

(D) Blocking

Q45. Study the yoga posture illustrated in the figure given below and identify the asana:

The posture shown in the image helps in improving body balance, concentration, and stability by standing steadily on one leg. Name this asana.

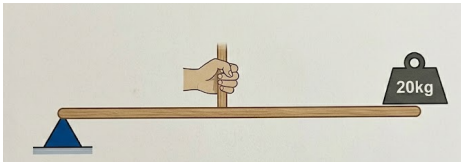
(A) Vajrasana

(B) Bhujangasana

(C) Vrikshasana

(D) Tadasana

Q46. Observe the following diagram related to biomechanics and identify the class of lever represented below:



In the figure, the effort is applied between the fulcrum and the load, which allows greater speed and movement range during physical activity. Identify the class of lever shown.

(A) First-Class Lever

(B) Second-Class Lever

(C) Third-Class Lever

(D) Fourth-Class Lever

Q47. Health experts classify diseases into communicable and non-communicable categories based on their mode of transmission and causes. Diseases such as diabetes and hypertension generally develop due to unhealthy lifestyle habits, lack of exercise, stress, and improper nutrition. These diseases are categorized as:

(A) Communicable Diseases

(B) Water-borne Diseases

(C) Non-Communicable Diseases

(D) Air-borne Diseases

Q48. Psychologists have proposed different personality theories to explain human behaviour and characteristics. According to the Big Five Personality Theory, which of the following traits is considered one of the major personality dimensions?

(A) Dominance

(B) Aggression

(C) Agreeableness

(D) Isolation

Q49. Kriyas are cleansing techniques practiced in yoga for purifying the internal systems of the body and maintaining good health. Which of the following yogic kriyas is mainly associated with cleansing the nasal passage using water or a thread?

(A) Dhauti

(B) Neti

(C) Nauli

(D) Kapalbhati

Q50. Sports training and regular exercise bring several positive physiological adaptations in the muscular and respiratory systems of the human body. One important long-term effect of regular exercise on muscles is:

(A) Decrease in muscular endurance

(B) Weakening of muscle fibres

(C) Increase in muscular strength and efficiency

(D) Reduction in blood supply to muscles

Detailed Solutions

Q1.

Solution

Concept: Understanding key government healthcare initiatives in India focused on rural areas and accessibility.

Solution: The question describes a significant Indian government healthcare initiative with several core objectives: improving medical facilities in rural regions, ensuring healthcare access for economically weaker sections, focusing on maternal and child health, promoting disease prevention, and strengthening healthcare infrastructure at the village level. The National Rural Health Mission (NRHM), launched in 2005, was a comprehensive and ambitious program designed precisely to address these multifaceted challenges. It aimed to provide accessible, affordable, and quality healthcare to all, with a particular emphasis on underserved rural populations and marginalized communities. The other options are related to different national programs: Fit India Movement promotes fitness, Khelo India focuses on sports development, and POSHAN Abhiyaan targets malnutrition. Therefore, the NRHM is the correct answer.

Final Answer : National Rural Health Mission

Answer: (B)

Q2.

Solution

Concept: The primary goals and rationale behind the Mid-Day Meal Scheme in India.

Solution: The Mid-Day Meal Scheme, also known as the National Programme of Nutritional Support to Primary Education, was instituted with the overarching aim of improving children's well-being and encouraging their engagement with education. The scheme primarily seeks to combat classroom hunger by providing a nutritious meal to students, thereby enhancing their concentration and learning capabilities. Crucially, by making school more attractive and reducing the financial burden on families, it also serves as a powerful incentive for parents to send their children to school regularly, thus contributing significantly to reducing the dropout rate. Options A and B relate to sports and yoga, while option D is about athlete selection; neither aligns with the core purpose of the Mid-Day Meal Scheme.

Final Answer : Reduction in dropout rate and improvement in nutrition

Answer: (C)

Q3.

Solution

Concept: Distinguishing between different categories of diseases based on their nature and transmission.

Solution: The question defines diseases that spread from person to person through various mediums like air, water, food, or contact. Such diseases are termed 'communicable diseases' or 'infectious diseases.' These diseases are caused by pathogens (like bacteria, viruses, fungi, or parasites) that can be transmitted from an infected individual or their environment to a susceptible one. Tuberculosis (TB) is a prime example of a communicable disease caused by the bacterium *Mycobacterium tuberculosis*, which primarily spreads through respiratory droplets when an infected person coughs, sneezes, or speaks. Lifestyle diseases are typically associated with habits like diet and lack of exercise (e.g., heart disease, diabetes type 2). Deficiency diseases result from a lack of essential nutrients (e.g., scurvy from Vitamin C deficiency). Genetic disorders are inherited conditions passed down through genes.

Final Answer : Communicable disease

Answer: (C)

Q4.

Solution

Concept: Pioneering theories of personality, specifically the concepts of introversion and extroversion.

Solution: The classification of human personalities into categories such as introverts and extroverts, based on their orientation towards the external world versus their inner psychological experiences, is a seminal contribution by the Swiss psychiatrist Carl Jung. Jung proposed that individuals primarily direct their psychic energy either outwards towards people and activities (extroversion) or inwards towards their own thoughts and feelings (introversion). While Sigmund Freud's work was foundational in psychology, his primary focus was on psychosexual development and the unconscious mind. Sheldon is known for his somatotype theory relating body types to personality, and Allport for his trait theory, but Jung is credited with popularizing the introvert-extrovert dichotomy.

Final Answer : Carl Jung

Answer: (B)

Q5.

Solution

Concept: Understanding the fundamental roles and terminology of players in the sport of Kabaddi.

Solution: In Kabaddi, the player who ventures into the opponent's half of the court with the primary objective of touching one or more defenders and then successfully returning to their own half without being tackled, all while continuously chanting the word "Kabaddi," is designated as a Raider. The Raider's offensive maneuvers are crucial for scoring points. The players on the opposing team attempting to stop the Raider are known as Defenders. Terms like 'Defender', 'Striker', and 'Goalkeeper' are standard in other sports but do not accurately describe the role of the attacking player in Kabaddi.

Final Answer : Raider

Answer: (C)

Q6.

Solution

Concept: Identifying specific yoga postures (asanas) and their associated benefits, particularly for balance and concentration.

Solution: The yoga posture described, which mimics the stable and balanced stance of a tree and is highly effective in enhancing body balance and improving concentration, is known as Vrikshasana. The name itself, 'Vriksha' meaning 'tree' in Sanskrit, directly alludes to its form. The practitioner stands on one leg, placing the sole of the other foot on the inner thigh or calf of the standing leg, with hands in a prayer position or extended upwards, thereby achieving a tree-like stance. Bhujangasana is the Cobra Pose, Vajrasana is the Thunderbolt Pose (seated), and Tadasana is the Mountain Pose (standing), none of which specifically embody the resemblance to a tree.

Final Answer : Vrikshasana

Answer: (C)

Q7.

Solution

Concept: Understanding the diverse functions of various nutrients within the human body, with a focus on energy provision.

Solution: The human body requires a variety of nutrients to function optimally. Among these, carbohydrates are the primary and most readily available source of energy. They are metabolized into glucose, which serves as the fuel for all bodily activities, including essential daily functions and strenuous physical exertion like sports. Proteins are vital for building and repairing tissues, enzyme production, and immune function. Vitamins and minerals are micronutrients that, while indispensable for numerous metabolic processes, do not directly provide energy in the same way as carbohydrates.

Final Answer : Carbohydrates

Answer: (C)

Q8.

Solution

Concept: Recognizing and differentiating common postural deformities of the human body.

Solution: The condition characterized by the knees touching or coming close to each other when standing straight, leading to an inward angulation of the legs, is scientifically termed 'Genu Valgum', commonly known as Knock Knees. This alignment issue can affect gait and may cause discomfort. Flat Foot (Pes Planus) refers to the flattening of the foot's arch. Kyphosis describes an exaggerated outward curvature of the upper spine (hunchback), and Lordosis is an exaggerated inward curvature of the lower spine (swayback).

Final Answer : Knock Knees

Answer: (B)

Q9.

Solution

Concept: Identifying India's highest national award conferred upon athletes for exceptional sporting achievements.

Solution: India's premier sporting honor, bestowed upon athletes for their spectacular and outstanding performances at the international level over a significant period, is the Major Dhyan Chand Khel Ratna Award. Previously known as the Rajiv Gandhi Khel Ratna Award, it recognizes excellence in sports. The Arjuna Award is a prestigious award for outstanding achievement in sports, but it is considered the second-highest. The Dronacharya Award is specifically for coaches who have achieved outstanding results in training athletes. The Padma Shri is a civilian honor awarded by the Government of India for distinguished service in various fields, including sports, but it is not solely a sports award nor the highest sporting honor.

Final Answer : Major Dhyan Chand Khel Ratna Award

Answer: (C)

Q10.

Solution

Concept: Differentiating between types of muscle contractions and their corresponding exercise classifications.

Solution: The question describes an exercise where muscle contraction occurs without any change in the joint angle or the length of the muscle itself. This type of contraction is known as an Isometric contraction, and exercises utilizing this principle are called Isometric exercises. A classic example is pushing against an unmovable object, like a wall; the muscles are actively contracting and generating force, but since there is no movement, their length remains constant. Isotonic exercises involve muscle contraction where the muscle length changes, such as in lifting weights. Isokinetic exercises involve movement at a constant speed, often facilitated by specialized equipment. Aerobic exercise focuses on improving cardiovascular endurance.

Final Answer : Isometric Exercise

Answer: (B)

Q11.

Solution

Concept: Understanding various training methods used in physical education to enhance endurance.

Solution: The case study explicitly mentions that the physical education teacher introduced "endurance-building activities through Fartlek training sessions." Fartlek training, derived from the Swedish term for "speed play," is a highly effective method for improving endurance. It involves unstructured variations in intensity and speed during a continuous run, often incorporating natural changes in terrain. This allows athletes to work on both aerobic and anaerobic capacities. Circuit training involves performing a series of exercises in a set sequence, plyometric training focuses on explosive movements, and interval weight training combines strength and endurance through timed weightlifting sets.

Final Answer : Fartlek Training

Answer: (B)

Q12.

Solution

Concept: Identifying common postural deformities, specifically those affecting the feet.

Solution: The case study refers to a student "suffering from flat foot" and the need for corrective exercises to improve posture and walking. Flat foot, also known as pes planus, is a condition where the arch of the foot is either absent or significantly flattened, causing the entire sole of the foot to make contact with the ground. This can affect gait and biomechanics. Kyphosis and Lordosis are curvatures of the spine, and Scoliosis is a sideways curvature of the spine.

Final Answer : Flat Foot

Answer: (C)

Q13.

Solution

Concept: Understanding different types of bone fractures, particularly those common in children.

Solution: The passage describes a fracture sustained by a young participant as a "partial crack in the bone... which was later identified as a Greenstick fracture." This type of fracture is characteristically seen in children because their bones are more flexible than those of adults. A Greenstick fracture occurs when a bone bends and breaks only partially, without separating into distinct pieces, resembling the way a young, green twig snaps. Oblique fractures occur at an angle, compound fractures break through the skin, and comminuted fractures involve the bone breaking into multiple fragments.

Final Answer : Greenstick Fracture

Answer: (C)

Q14.

Solution

Concept: Understanding the role of macronutrients in body repair and growth.

Solution: The case study highlights the importance of certain nutrients for growth, tissue repair, and recovery after physical exertion. Among the macronutrients, proteins are primarily responsible for these functions. Proteins are the building blocks of the body, essential for the synthesis and repair of muscles, skin, hair, and other tissues. They also play a critical role in immune function and enzyme production. Carbohydrates are the primary source of energy. Fats, while important for energy storage and hormone production, are not the main tissue builders. Vitamins are crucial micronutrients for various bodily processes but do not directly perform the bulk of tissue repair and growth.

Final Answer : Proteins

Answer: (B)

Q15.

Solution

Concept: Identifying specific yogic practices and their characteristic sequences.

Solution: The description mentions a yogic practice performed every morning, involving a sequence of twelve postures performed rhythmically with controlled breathing. This specific sequence is the hallmark of Suryanamaskar (Sun Salutation). Suryanamaskar is a foundational yoga practice that synchronizes breath with movement, flowing through a series of asanas that invigorate the body and mind. Kapalbhati and Anulom Vilom are pranayama (breathing) techniques, and Vajrasana is a single seated posture.

Final Answer : Suryanamaskar

Answer: (C)

Q16.

Solution

Concept: Understanding different physical fitness tests and their specific objectives.

Solution: The case study mentions that "Agility drills including shuttle runs were regularly conducted to improve quick movement and directional changes among players." The Shuttle Run Test is specifically designed to measure an individual's ability to accelerate, decelerate, and change direction quickly, which are key components of agility in sports like football. The Flamingo Balance Test measures balance, the Cooper Test measures aerobic fitness over a set distance, and the Harvard Step Test assesses cardiovascular fitness.

Final Answer : Shuttle Run Test

Answer: (B)

Q17.

Solution

Concept: Classifying body types according to Sheldon's somatotype theory.

Solution: Sheldon's somatotype theory categorizes human physiques into three types: Endomorph (characterized by a rounder, softer physique with a tendency to gain fat), Ectomorph (characterized by a lean, linear physique with minimal body fat), and Mesomorph (characterized by a muscular, athletic, and well-built physique with a strong bone structure). The case study identifies a player with a "muscular and athletic body structure" as a mesomorph, which aligns perfectly with this classification. Introvert is a personality trait, not a body type.

Final Answer : Mesomorph

Answer: (C)

Q18.

Solution

Concept: Differentiating between types of aggression in sports psychology.

Solution: The case study mentions that the coach noticed players becoming "overly aggressive during competitive situations." In sports psychology, aggression is categorized in various ways. Instrumental aggression is defined as aggressive behavior performed as a means to an end, to achieve a goal (like winning a game or making a tackle), and is often within the rules of the sport. Hostile aggression, on the other hand, is driven by anger and the intent to harm the opponent. The question describes aggression that is "controlled within the rules and regulations of sports competition and is used strategically to achieve performance goals," which is the definition of Instrumental Aggression.

Final Answer : Instrumental Aggression

Answer: (B)

Q19.

Solution

Concept: Understanding Newton's Laws of Motion and their common names.

Solution: Newton's First Law of Motion states that an object at rest stays at rest and an object in motion stays in motion with the same speed and in the same direction unless acted upon by an unbalanced force. This principle is commonly known as the Law of Inertia. The coach explaining kicking techniques would be applying this law, as the ball will remain at rest until kicked (an external force applied) and will continue in motion until acted upon by forces like friction or air resistance. Newton's Second Law relates force, mass, and acceleration, and Newton's Third Law describes action-reaction pairs.

Final Answer : Inertia

Answer: (B)

Q20.

Solution

Concept: Distinguishing between intrinsic and extrinsic motivation in sports.

Solution: The case study states that the coach used "motivational techniques such as appreciation, rewards, and positive feedback." These are external incentives provided to the athlete. Motivation that comes from external rewards or recognition, rather than from the inherent satisfaction of the activity itself, is classified as Extrinsic Motivation. Intrinsic motivation arises from personal enjoyment, interest, or satisfaction derived directly from the activity. Anxiety management and aggressive behaviour are different psychological concepts.

Final Answer : Extrinsic Motivation

Answer: (B)

Q21.

Solution

Concept: Fundamental technical skills in the sport of hockey.

Solution: In hockey, players need to skillfully maneuver the ball. Dribbling is the fundamental skill used to move the ball forward along the ground while maintaining close control over it, using short touches of the stick. This allows the player to evade opponents and maintain possession. Blocking is a defensive action. Smashing and Heading are terms typically associated with sports like volleyball or football, respectively, and are not primary skills in hockey for ball advancement and control.

Final Answer : Dribbling

Answer: (B)

Q22.

Solution

Concept: Standard measurements and dimensions in the sport of cricket.

Solution: The cricket pitch is the central strip of the field where the game is played. Its official length, measured from the base of the stumps at one end to the base of the stumps at the other, is precisely 22 yards. This measurement is crucial for determining fair play, pacing, and the timing of the game. 18 yards is the distance of the bowling crease from the stumps, and 20 and 24 yards are not standard cricket pitch measurements.

Final Answer : 22 Yards

Answer: (C)

Q23.

Solution

Concept: Identifying specific yogic pranayama techniques and their physiological effects.

Solution: The question describes a pranayama technique known for its cooling effect, particularly beneficial in hot weather. This technique is Sheetali Pranayama, often referred to as "cooling breath." It involves drawing air in through a curled tongue, which cools the air before it enters the lungs, thereby cooling the body and mind. Bhastrika and Kapalbhati are heating pranayamas that increase energy, and Ujjayi is often called the "victorious breath" and has a warming or balancing effect.

Final Answer : Sheetali

Answer: (C)

Q24.

Solution

Concept: Understanding the impact of vitamin deficiencies on health.

Solution: The question correctly identifies Vitamin D deficiency as weakening bones and affecting bone development, especially in children. The disease caused by a severe lack of Vitamin D, leading to soft, weak, and deformed bones, is called Rickets. Scurvy is caused by Vitamin C deficiency, Night Blindness by Vitamin A deficiency, and Beriberi by Vitamin B1 (Thiamine) deficiency.

Final Answer : Rickets

Answer: (C)

12

Q25.

Solution

Concept: Recognizing specific Indian national sports awards and their categories.

Solution: The Dronacharya Award is the premier award in India specifically dedicated to recognizing excellence in sports coaching. It is presented to coaches who have consistently trained athletes to achieve outstanding results and remarkable performances at national and international competitions. The Arjuna Award is for outstanding players, and the Major Dhyan Chand Khel Ratna Award (formerly Rajiv Gandhi Award) is for outstanding athletes.

Final Answer : Dronacharya Award

Answer: (B)

Q26.

Solution

Concept: Understanding diverse training methodologies employed to enhance various components of physical fitness, particularly endurance and speed.

Solution: The question describes a training method that is characterized by its flexibility and ability to improve both speed and endurance by varying the intensity of running. This "speed play" approach, where athletes can spontaneously alter their pace between fast and slow running according to their own comfort and training objectives, is precisely what defines Fartlek Training. It's a more adaptable form of continuous training. Circuit Training involves performing a series of exercises in a sequential circuit. Weight Training is focused on developing muscular strength and hypertrophy. Plyometric Training emphasizes explosive power through stretch-shortening cycles.

Final Answer : Fartlek Training

Answer: (C)

Q27.

Solution

Concept: Differentiating between types of muscle contractions and categorizing exercises based on these contractions, with a focus on movement-producing activities.

Solution: The core of this question lies in understanding how muscles function during exercise. When a muscle changes its length to produce movement around a joint—meaning it either shortens (concentric contraction) or lengthens (eccentric contraction)—it is performing an Isotonic contraction. Exercises like lifting weights, where the biceps muscle shortens as the weight is lifted (concentric) and lengthens as it's lowered under control (eccentric), are prime examples. Isometric exercises involve muscle tension without a change in length, such as pushing against an immovable object. Isokinetic exercises maintain a constant speed of movement, often with specialized equipment. Static exercise is a broader term that can encompass isometric holds.

Final Answer : Isotonic Exercise

Answer: (B)

Q28.

Solution

Concept: Understanding advanced stretching techniques used to improve flexibility and range of motion, specifically PNF stretching.

Solution: PNF stretching is a sophisticated technique recognized for its effectiveness in enhancing flexibility by utilizing the body's own reflexes and muscle engagement. It involves a cycle of muscle contraction and relaxation, often with the assistance of a partner, to achieve a greater range of motion. The full and correct expansion of the acronym PNF is Proprioceptive Neuromuscular Facilitation. This name accurately reflects its mechanism: it works by stimulating proprioceptors (sensory nerve endings in muscles and tendons) to "facilitate" (encourage) a greater degree of stretch. The other options are plausible-sounding but incorrect expansions of the acronym.

Final Answer : Proprioceptive Neuromuscular Facilitation

Answer: (C)

Q29.

Solution

Concept: Identifying specific physical fitness tests designed to evaluate particular fitness components, with an emphasis on balance assessment.

Solution: Body balance is a crucial aspect of physical fitness, impacting coordination and stability. The test that specifically requires an individual to maintain balance on one leg on a narrow platform for a specified period is the Flamingo Balance Test. This test directly measures static balance and is a common tool in physical education to assess this fitness component. The Shuttle Run Test measures agility, the Harvard Step Test evaluates cardiovascular fitness, and the Cooper Test assesses aerobic endurance.

Final Answer : Flamingo Balance Test

Answer: (B)

Q30.

Solution

Concept: Recognizing specialized fitness assessment batteries tailored for specific demographic groups, particularly the elderly.

Solution: Assessing the physical fitness of senior citizens requires tests that are relevant to their functional capabilities and daily living needs. The Rikli and Jones Test is a well-established and widely used battery of tests specifically designed to evaluate the functional fitness of older adults, covering areas like strength, flexibility, agility, and endurance. The AAHPER test is a more general fitness test. The Kraus-Weber test focuses on basic flexibility and strength. The Cooper Endurance Test is primarily an aerobic fitness assessment.

Final Answer : Rikli and Jones Test

Answer: (C)

Q31.

Solution

Concept: Understanding the fundamental principles of Newton's Laws of Motion and their common nomenclature.

Solution: Newton's First Law of Motion, often cited as the basis for understanding motion and forces, describes the tendency of objects to resist changes in their state of motion. Whether at rest or in uniform motion, an object will continue in that state unless compelled by an external, unbalanced force to alter it. This inherent property of matter is known as Inertia. Therefore, Newton's First Law is commonly referred to as the Law of Inertia. Momentum is a product of mass and velocity (related to Newton's Second Law). Gravitation is a force of attraction between masses. Acceleration is the rate of change of velocity (as described by Newton's Second Law).

Final Answer : Inertia

Answer: (C)

Q32.

Solution

Concept: Applying the principles of lever systems in biomechanics to analyze human body movements and identify different classes of levers.

Solution: Levers in the human body are classified based on the relative positions of the fulcrum, effort, and load. In a third-class lever system, the effort is applied between the fulcrum and the load. This arrangement is common in the body and is optimized for speed and range of motion, rather than for generating a large amount of force. The bicep curl at the elbow joint perfectly exemplifies a third-class lever: the elbow is the fulcrum, the biceps muscle contraction provides the effort, and the weight held in the hand is the load. Standing on toes involves a second-class lever (fulcrum at the ball of the foot, effort from calf muscles, load from body weight). A seesaw is a typical first-class lever (fulcrum in the middle). A wheelbarrow is a second-class lever.

Final Answer : Bicep curl at elbow joint

Answer: (C)

Q33.

Solution

Concept: Understanding the physiological adaptations of the cardiovascular system that result from consistent engagement in physical activity and exercise.

Solution: Regular physical activity is highly beneficial for the cardiovascular system. One of the most significant long-term effects is the improvement in the efficiency of the heart. Through exercise, the heart muscle becomes stronger and more capable of pumping a larger volume of blood with each beat. This leads to a decrease in resting heart rate, improved blood circulation throughout the body, and enhanced delivery of oxygen and nutrients to tissues. Conversely, exercise does not weaken heart muscles, reduce blood circulation, or decrease lung capacity; these are counter-intuitive to its positive effects.

Final Answer : Increase in efficiency of the heart

Answer: (C)

Q34.

Solution

Concept: Identifying effective and inclusive pedagogical strategies for physical education, particularly for Children With Special Needs (CWSN).

Solution: The principle of inclusive education is to ensure that all students, irrespective of their abilities or disabilities, have the opportunity to participate fully and benefit from educational activities. For Children With Special Needs (CWSN) in physical education, the most effective strategy is to adapt activities to meet their individual requirements. This involves modifying the rules, equipment, or environment to allow for safe and meaningful participation, skill development, and social interaction. Excluding them, confining them to theoretical lessons, or conducting separate, isolated examinations would be contrary to inclusive practices.

Final Answer : Using adapted physical activities according to individual needs

Answer: (C)

Q35.

Solution

Concept: Distinguishing between intrinsic and extrinsic motivation and their influence on participation and performance in sports.

Solution: Motivation is the psychological force that propels individuals towards a goal. When an athlete engages in sports primarily for the inherent satisfaction, enjoyment, sense of accomplishment, or personal interest derived from the activity itself, this is termed Intrinsic Motivation. It stems from within the individual and is often associated with higher levels of commitment and persistence. Extrinsic Motivation, in contrast, is driven by external factors such as rewards, recognition, praise, or the avoidance of punishment. Negative motivation and forced motivation are not recognized as standard psychological constructs in this context.

Final Answer : Intrinsic Motivation

Answer: (B)

Q36.

Solution

Concept: Understanding the standardized dimensions and structural components of equipment used in international sports, specifically football goalposts.

Solution: The goalposts in football are a critical element of the game's field of play. According to international football regulations (governed by FIFA's Laws of the Game), the goal structure, consisting of the two upright posts and the crossbar connecting them, defines a rectangular opening. While the posts themselves might be cylindrical, the overall frame that encloses the scoring area is rectangular. This ensures uniformity and fairness across all matches. Describing the shape as purely circular, triangular, or cylindrical would be inaccurate for the entire goal structure.

Final Answer : Rectangular

Answer: (C)

Q37.

Solution

Concept: Identifying specific yogic postures (asanas) and their well-documented physiological benefits, particularly for the digestive system.

Solution: Vajrasana, often referred to as the Thunderbolt Pose or Diamond Pose, is a yoga posture particularly noted for its benefits to the digestive system. It involves sitting back on the heels, which gently massages the abdominal organs and is believed to stimulate digestive fire and improve digestion. It is one of the few asanas that can be comfortably practiced after a meal. Bhujangasana (Cobra Pose) is a backbend, Padmasana (Lotus Pose) is a meditation pose, and Shirshasana (Headstand) is an inversion; none are primarily recommended for post-meal digestion.

Final Answer : Vajrasana

Answer: (B)

Q38.

Solution

Concept: Understanding the distinct roles of various nutrients in maintaining bodily functions, with a specific focus on tissue repair and maintenance.

Solution: Proteins are essential macronutrients that serve as the fundamental building blocks of the body. They are crucial for the continuous process of repairing and maintaining worn-out body tissues, synthesizing new cells, and facilitating muscle growth and recovery. When tissues are damaged or undergo natural wear and tear, proteins provide the necessary amino acids to rebuild them. Carbohydrates are primarily for energy, while minerals and vitamins, although vital, act more as cofactors and regulators in metabolic processes rather than direct building materials for tissue repair.

Final Answer : Proteins

Answer: (B)

Q39.

Solution

Concept: Classifying bone fractures based on their characteristic patterns of breakage and severity.

Solution: Fracture classification helps in understanding the nature of the injury and guiding treatment. An Oblique Fracture is specifically defined by a break that occurs at an angle across the bone shaft, creating a diagonal fracture line. This is distinct from other types: Greenstick fractures are incomplete breaks common in children; Compound fractures involve the bone piercing the skin; and Comminuted fractures are characterized by the bone breaking into multiple fragments.

Final Answer : Oblique Fracture

Answer: (B)

Q40.

Solution

Concept: Understanding the educational pathways and progression in the field of Physical Education and Sports Sciences.

Solution: For individuals aiming to specialize in physical education at an advanced academic and professional level, pursuing a Master's degree following a Bachelor's degree is the standard progression. The M.P.Ed (Master of Physical Education) program builds upon the foundational knowledge gained in a B.P.Ed (Bachelor of Physical Education), offering in-depth study, research opportunities, and specialization in areas like sports coaching, exercise physiology, sports psychology, and sports management. Diplomas and Certificates, while valuable, typically focus on specific skill sets rather than providing the comprehensive, advanced academic training characteristic of a Master's degree for specialists.

Final Answer : M.P.Ed

Answer: (C)

Q41.

Solution

Concept: Understanding field tests used in physical education to evaluate agility, speed, and coordination.

Solution: The description of participants running back and forth rapidly between two parallel lines at a fixed distance is a direct definition of the Shuttle Run Test. This test is a standard measure of an individual's ability to accelerate, decelerate, and change direction quickly, which are critical components of agility and coordination, especially in sports like football, basketball, and track and field. The Cooper Test is for aerobic endurance, the Harvard Step Test measures cardiovascular fitness, and the Flamingo Balance Test assesses static balance.

Final Answer : Shuttle Run Test

Answer: (C)

Q42.

Solution

Concept: Applying the principles of lever systems in biomechanics to analyze human body movements and identify different classes of levers.

Solution: In biomechanics, a second-class lever is characterized by the load being positioned between the fulcrum and the effort. This arrangement typically provides a mechanical advantage, allowing for the movement of heavier loads with less effort, although often with a reduced range of motion. In the human body, standing on toes is a classic example of a second-class lever: the ball of the foot acts as the fulcrum, the body's weight is the load, and the calf muscles provide the effort. A bicep curl is a third-class lever, a seesaw is typically a first-class lever, and neck movements can involve various lever classes depending on the specific action.

Final Answer : Standing on Toes

Answer: (C)

Q43.

Solution

Concept: Understanding the educational pathways for pursuing a career in physical education after completing secondary education (Class 12).

Solution: For students aspiring to enter the field of physical education professionally immediately after completing Class 12, the foundational undergraduate degree is the Bachelor of Physical Education (B.P.Ed.). This program provides the necessary theoretical knowledge and practical skills for teaching and coaching. M.P.Ed is a postgraduate degree, Ph.D. in Sports Science is an even higher academic qualification, and a Diploma in Physiotherapy, while related to health and rehabilitation, is a distinct professional field.

Final Answer : B.P.Ed

Answer: (B)

Q44.

Solution

Concept: Identifying fundamental technical skills in the sport of hockey, with a visual representation.

Solution: The image clearly depicts a hockey player using their stick to move the ball along the ground while maintaining close control. This fundamental skill, crucial for advancing the ball, evading defenders, and maintaining possession, is known as Dribbling. Tackling involves dispossessing an opponent. Hitting is a more powerful stroke. Blocking is a defensive maneuver. The player's controlled movement of the ball with the stick is the defining characteristic of dribbling.

Final Answer : Dribbling

Answer: (C)

Q45.

Solution

Concept: Identifying specific yoga postures (asanas) based on their visual representation and benefits.

Solution: The image shows a person standing on one leg, with the sole of the other foot placed against the inner thigh of the standing leg, arms extended upwards, mimicking the stance of a tree. This posture is known as Vrikshasana, which translates to "Tree Pose" in English. It is highly regarded for improving balance, concentration, and stability. Vajrasana is a seated posture, Bhujangasana is the Cobra Pose, and Tadasana is the Mountain Pose (a basic standing pose but not specifically resembling a tree).

Final Answer : Vrikshasana

Answer: (C)

Q46.

Solution

Concept: Understanding the biomechanical classification of levers and identifying them from diagrams.

Solution: The diagram illustrates a lever system where the effort (E) is applied between the fulcrum (F) and the load (L). This arrangement, F - E - L, is the defining characteristic of a third-class lever. Third-class levers are common in the human body (like the forearm during a bicep curl) and are advantageous for producing rapid, wide-ranging movements, albeit with a mechanical disadvantage in terms of force amplification. First-class levers have the fulcrum between the effort and load (e.g., seesaw). Second-class levers have the load between the fulcrum and effort (e.g., standing on toes). Fourth-class levers are not a standard classification in biomechanics.

Final Answer : Third-Class Lever

Answer: (C)

Q47.

Solution

Concept: Classifying diseases based on their causes and modes of transmission, differentiating between communicable and non-communicable diseases.

Solution: Diseases like diabetes and hypertension, which often develop over time due to factors such as unhealthy lifestyle choices (diet, lack of exercise, stress), are categorized as Non-Communicable Diseases (NCDs). These conditions are generally not transmitted from one person to another. Communicable diseases, conversely, are caused by infectious agents and can spread. Water-borne and air-borne diseases are subcategories of communicable diseases based on their transmission routes.

Final Answer : Non-Communicable Diseases

Answer: (C)

Q48.

Solution

Concept: Understanding major personality theories and their constituent traits, specifically the Big Five Personality Theory.

Solution: The Big Five Personality Theory, also known as the Five Factor Model (FFM), is a widely accepted framework for understanding personality. It proposes that personality can be described along five broad dimensions: Openness to Experience, Conscientiousness, Extraversion, Agreeableness, and Neuroticism. Of the options provided, Agreeableness is one of the core traits of this model, reflecting tendencies to be cooperative, compassionate, and considerate. Dominance and Aggression can be related to extraversion or neuroticism but are not primary dimensions themselves, and Isolation is a state or behavior rather than a personality trait in this model.

Final Answer : Agreeableness

Answer: (C)

Q49.

Solution

Concept: Understanding yogic cleansing techniques (Kriyas) and their specific applications for bodily purification.

Solution: Yogic Kriyas are purification practices designed to cleanse the body internally. Neti is a Kriya specifically aimed at cleansing the nasal passages. It can be performed with water (Jala Neti) or with a specialized string or cloth (Sutra Neti), helping to clear mucus, improve breathing, and prepare the respiratory system. Dhauti involves cleansing the upper digestive tract, Nauli is an abdominal massage technique, and Kapalbhati is a breathing exercise that also involves forceful exhalations.

Final Answer : Neti

Answer: (B)

Q50.

Solution

Concept: Understanding the long-term physiological adaptations of the muscular system due to consistent engagement in sports training and regular exercise.

Solution: Regular physical activity and sports training lead to significant improvements in the muscular system. One of the most prominent long-term effects is an increase in muscular strength, endurance, and overall efficiency. Muscles become better at utilizing oxygen, developing greater capacity to perform work for extended periods and with increased force. Conversely, exercise does not decrease muscular endurance, weaken muscle fibers, or reduce blood supply to muscles; these would be detrimental outcomes.

Final Answer : Increase in muscular strength and efficiency

Answer: (C)

Answer Key

Q	Ans	Q	Ans	Q	Ans	Q	Ans	Q	Ans
1	B	2	C	3	C	4	B	5	C
6	C	7	C	8	B	9	C	10	B
11	B	12	C	13	C	14	B	15	C
16	B	17	C	18	B	19	B	20	B
21	B	22	C	23	C	24	C	25	B
26	C	27	B	28	C	29	B	30	C
31	C	32	C	33	C	34	C	35	B
36	C	37	B	38	B	39	B	40	C
41	C	42	C	43	B	44	C	45	C
46	C	47	C	48	C	49	B	50	C