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**Previous Year Paper
(Electrical)
05 Dec, 2023 Shift 3**





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POWER GRID CORPORATION OF INDIA LIMITED
(A Government of India Enterprise)

Participant ID	
Participant Name	
Test Center Name	
Test Date	05/12/2023
Test Time	4:30 PM - 6:30 PM
Subject	Diploma Trainee Electrical

Section : Electrical Engineering

Q.1 Which of the following is NOT a characteristic of an ideal operational amplifier?

- Ans ☒ 1. Finite open-loop gain
- ☐ 2. Infinite bandwidth
- ☐ 3. Infinite input impedance
- ☐ 4. Zero output impedance

Question ID : 630680485776
Option 1 ID : 6306801897322
Option 2 ID : 6306801897321
Option 3 ID : 6306801897319
Option 4 ID : 6306801897320
Status : Answered
Chosen Option : 1

Q.2 In mesh analysis, which of the following is true?

- Ans ☐ 1. Both inner and outer loops are considered.
- ☒ 2. Only one loop is considered at a time.
- ☐ 3. All loops are considered simultaneously.
- ☐ 4. Only outer loops are considered.

Question ID : 630680485690
Option 1 ID : 6306801896978
Option 2 ID : 6306801896975
Option 3 ID : 6306801896976
Option 4 ID : 6306801896977
Status : Answered
Chosen Option : 2

Q.3 Which equation correctly represents the relationship between self-inductance (L), mutual inductance (M), and the number of turns (N1 and N2) for two closely coupled coils?

- Ans ☒ 1. $M = L \times \sqrt{N1 \times N2}$
- ☒ 2. $L = M \times N1 \times N2$
- ☒ 3. $L = M / (N1 + N2)$
- ☒ 4. $M = L / (N1 \times N2)$

Question ID : 630680485798
Option 1 ID : 6306801897410
Option 2 ID : 6306801897407
Option 3 ID : 6306801897409
Option 4 ID : 6306801897408
Status : Answered
Chosen Option : 1

Q.4 The back e.m.f. in a DC motor opposes the:

- Ans ☒ 1. Load current
- ☒ 2. Armature current
- ☒ 3. Supply voltage
- ☒ 4. Field current

Question ID : 630680485716
Option 1 ID : 6306801897082
Option 2 ID : 6306801897080
Option 3 ID : 6306801897079
Option 4 ID : 6306801897081
Status : Answered
Chosen Option : 2

Q.5 Which component in an elevator control system primarily determines the elevator's direction and speed?

- Ans ☒ 1. Microcontroller
- ☒ 2. Door sensor
- ☒ 3. Relay
- ☒ 4. Floor button

Question ID : 630680485780
Option 1 ID : 6306801897337
Option 2 ID : 6306801897335
Option 3 ID : 6306801897338
Option 4 ID : 6306801897336
Status : Answered
Chosen Option : 1

Q.6 In a transmission line, the proximity effect is more pronounced when:

- Ans ☒ 1. The conductors are spaced far apart and the frequency is high.
- ☒ 2. The conductors are closely spaced and the frequency is low.
- ☒ 3. The conductors are closely spaced and the frequency is high.
- ☒ 4. The conductors are spaced far apart and the frequency is low.

Question ID : 630680485756
Option 1 ID : 6306801897241
Option 2 ID : 6306801897240
Option 3 ID : 6306801897242
Option 4 ID : 6306801897239
Status : Answered
Chosen Option : 3

Q.7 Given a single-phase transformer with a turns ratio of 10:1, a primary voltage of 220V, and a frequency of 50Hz, if the flux in the core is sinusoidal and has a maximum value of 0.02 Wb, what is the peak value of the induced EMF in the secondary winding?

- Ans
- ☒ 1. 2200V
 - ☒ 2. 440V
 - ☒ 3. 628V
 - ☒ 4. 314V

Question ID : 630680485722
Option 1 ID : 6306801897104
Option 2 ID : 6306801897103
Option 3 ID : 6306801897106
Option 4 ID : 6306801897105
Status : Not Answered
Chosen Option : --

Q.8 In which closed-loop configuration does an operational amplifier provide phase inversion?

- Ans
- ☒ 1. Differential amplifier
 - ☒ 2. Inverting amplifier
 - ☒ 3. Voltage follower
 - ☒ 4. Non-inverting amplifier

Question ID : 630680485777
Option 1 ID : 6306801897326
Option 2 ID : 6306801897323
Option 3 ID : 6306801897325
Option 4 ID : 6306801897324
Status : Answered
Chosen Option : 2

Q.9 In an AC locomotive, the primary source of power is derived from _____.

- Ans
- ☒ 1. Ground rails
 - ☒ 2. Diesel engine
 - ☒ 3. Batteries
 - ☒ 4. Overhead lines

Question ID : 630680485795
Option 1 ID : 6306801897398
Option 2 ID : 6306801897396
Option 3 ID : 6306801897395
Option 4 ID : 6306801897397
Status : Answered
Chosen Option : 4

Q.10 What is a distinct advantage of the Ring distribution system over radial distribution?

- Ans
- ☒ 1. Increased reliability due to multiple paths for power flow
 - ☒ 2. Simpler design and construction
 - ☒ 3. Lower maintenance costs
 - ☒ 4. Reduced material usage

Question ID : 630680485764
Option 1 ID : 6306801897271
Option 2 ID : 6306801897272
Option 3 ID : 6306801897274
Option 4 ID : 6306801897273
Status : Answered
Chosen Option : 1

Q.11 Which type of position encoder uses light and sensors to determine position?

- Ans ☒ 1. Capacitive Encoder
☒ 2. Optical Encoder
☒ 3. Resistive Encoder
☒ 4. Magnetic Encoder

Question ID : 630680485784
Option 1 ID : 6306801897351
Option 2 ID : 6306801897353
Option 3 ID : 6306801897352
Option 4 ID : 6306801897354
Status : Answered
Chosen Option : 2

Q.12 Which bridge is used for the measurement of inductance?

- Ans ☒ 1. Maxwell's bridge
☒ 2. Kelvin's bridge
☒ 3. Wheatstone bridge
☒ 4. Anderson's bridge

Question ID : 630680485708
Option 1 ID : 6306801897047
Option 2 ID : 6306801897048
Option 3 ID : 6306801897049
Option 4 ID : 6306801897050
Status : Answered
Chosen Option : 1

Q.13 In a DC motor, torque is directly proportional to:

- Ans ☒ 1. Back e.m.f.
☒ 2. Armature current
☒ 3. Motor speed
☒ 4. Supply voltage

Question ID : 630680485721
Option 1 ID : 6306801897099
Option 2 ID : 6306801897100
Option 3 ID : 6306801897102
Option 4 ID : 6306801897101
Status : Answered
Chosen Option : 2

Q.14 In node analysis, which element is taken as a reference?

- Ans ☒ 1. Ground or zero voltage node
☒ 2. Node with maximum branches
☒ 3. Highest voltage node
☒ 4. Node with minimum branches

Question ID : 630680485691
Option 1 ID : 6306801896980
Option 2 ID : 6306801896981
Option 3 ID : 6306801896979
Option 4 ID : 6306801896982
Status : Answered
Chosen Option : 1

Q.15 The synchronous motor runs at a speed that is synchronized with _____.

- Ans
- ☒ 1. Load torque
 - ☒ 2. Supply frequency
 - ☒ 3. Rotor speed
 - ☒ 4. Stator speed

Question ID : 630680485735
Option 1 ID : 6306801897156
Option 2 ID : 6306801897155
Option 3 ID : 6306801897157
Option 4 ID : 6306801897158
Status : Answered
Chosen Option : 2

Q.16 Leakage reactance in a transformer is due to:

- Ans
- ☒ 1. Core losses
 - ☒ 2. Leakage flux
 - ☒ 3. Copper losses
 - ☒ 4. Mutual flux

Question ID : 630680485723
Option 1 ID : 6306801897108
Option 2 ID : 6306801897109
Option 3 ID : 6306801897110
Option 4 ID : 6306801897107
Status : Answered
Chosen Option : 2

Q.17 Bio-chemical power plants primarily use which process for energy generation?

- Ans
- ☒ 1. Filtration
 - ☒ 2. Combustion
 - ☒ 3. Fermentation
 - ☒ 4. Distillation

Question ID : 630680485749
Option 1 ID : 6306801897214
Option 2 ID : 6306801897211
Option 3 ID : 6306801897212
Option 4 ID : 6306801897213
Status : Answered
Chosen Option : 2

Q.18 In a two-port network, the short-circuit admittance parameter Y_{21} represents _____.

- Ans
- ☒ 1. Transfer admittance from input to output
 - ☒ 2. Output admittance with input short-circuited
 - ☒ 3. Input admittance with output short-circuited
 - ☒ 4. Transfer admittance from output to input

Question ID : 630680485698
Option 1 ID : 6306801897008
Option 2 ID : 6306801897010
Option 3 ID : 6306801897009
Option 4 ID : 6306801897007
Status : Answered
Chosen Option : 4

Q.19 Which logic gate gives a high output only when both its inputs are low?

- Ans ☒ 1. NOR gate
- ☐ 2. AND gate
- ☐ 3. OR gate
- ☐ 4. NAND gate

Question ID : 630680485778
Option 1 ID : 6306801897329
Option 2 ID : 6306801897327
Option 3 ID : 6306801897328
Option 4 ID : 6306801897330
Status : Answered
Chosen Option : 1

Q.20 In a homo-polar transmission line, which of the following is a significant challenge that needs to be addressed?

- Ans ☐ 1. Reduction of skin effect
- ☐ 2. Balancing the three phases
- ☐ 3. Increasing the line capacitance
- ☒ 4. Mitigating the direct current magnetic fields

Question ID : 630680485789
Option 1 ID : 6306801897371
Option 2 ID : 6306801897372
Option 3 ID : 6306801897374
Option 4 ID : 6306801897373
Status : Answered
Chosen Option : 4

Q.21 The torque in a three-phase induction motor is maximum at a slip of:

- Ans ☒ 1. Between 0 and 1
- ☐ 2. Greater than 1
- ☐ 3. 0
- ☐ 4. 1

Question ID : 630680485730
Option 1 ID : 6306801897137
Option 2 ID : 6306801897138
Option 3 ID : 6306801897135
Option 4 ID : 6306801897136
Status : Answered
Chosen Option : 1

Q.22 Which of the following is NOT a category of FACTS controllers used in EHV transmission lines?

- Ans ☒ 1. Diagonal controllers
- ☐ 2. Shunt controllers
- ☐ 3. Combined series-shunt controllers
- ☐ 4. Series controllers

Question ID : 630680485790
Option 1 ID : 6306801897377
Option 2 ID : 6306801897376
Option 3 ID : 6306801897378
Option 4 ID : 6306801897375
Status : Answered
Chosen Option : 1

Q.23 What is the formula to calculate the receiving end voltage of a distributor?

- Ans
- ☐ 1. Receiving End Voltage = Sending End Voltage $\times$ Voltage Drop
 - ☐ 2. Receiving End Voltage = Sending End Voltage + Voltage Drop
 - ☒ 3. Receiving End Voltage = Sending End Voltage - Voltage Drop
 - ☐ 4. Receiving End Voltage = Voltage Drop / Sending End Voltage

Question ID : 630680485765
Option 1 ID : 6306801897277
Option 2 ID : 6306801897275
Option 3 ID : 6306801897276
Option 4 ID : 6306801897278
Status : Answered
Chosen Option : 3

Q.24 Scott connection in transformers is primarily used for:

- Ans
- ☐ 1. Voltage regulation
 - ☐ 2. Power factor correction
 - ☐ 3. Harmonic reduction
 - ☒ 4. Three-phase to two-phase conversion

Question ID : 630680485727
Option 1 ID : 6306801897125
Option 2 ID : 6306801897123
Option 3 ID : 6306801897126
Option 4 ID : 6306801897124
Status : Answered
Chosen Option : 4

Q.25 All day efficiency of a transformer is the ratio of:

- Ans
- ☐ 1. Maximum output to maximum input for 24 hours
 - ☐ 2. Minimum output to minimum input for 24 hours
 - ☒ 3. Total output to total input for 24 hours
 - ☐ 4. Average output to average input for 24 hours

Question ID : 630680485726
Option 1 ID : 6306801897121
Option 2 ID : 6306801897122
Option 3 ID : 6306801897119
Option 4 ID : 6306801897120
Status : Answered
Chosen Option : 3

Q.26 Differential protection of a bus bar is based on the principle of _____.

- Ans
- ☐ 1. Current grading
 - ☐ 2. Time grading
 - ☐ 3. Voltage grading
 - ☒ 4. Comparison of incoming and outgoing currents

Question ID : 630680485805
Option 1 ID : 6306801897436
Option 2 ID : 6306801897435
Option 3 ID : 6306801897438
Option 4 ID : 6306801897437
Status : Answered
Chosen Option : 4

Q.27 The illumination level in a room is determined by the ratio of _____.

- Ans ☒ 1. Luminous flux to the area
☐ 2. Luminous flux to the volume
☐ 3. Luminous intensity to the distance
☐ 4. Luminous intensity to the area

Question ID : 630680485796
Option 1 ID : 6306801897399
Option 2 ID : 6306801897401
Option 3 ID : 6306801897400
Option 4 ID : 6306801897402
Status : Answered
Chosen Option : 4

Q.28 A real-world voltage source that has some internal resistance is termed as:

- Ans ☐ 1. Dependent voltage source
☐ 2. Independent voltage source
☐ 3. Ideal voltage source
☒ 4. Non-ideal voltage source

Question ID : 630680485775
Option 1 ID : 6306801897317
Option 2 ID : 6306801897318
Option 3 ID : 6306801897315
Option 4 ID : 6306801897316
Status : Answered
Chosen Option : 4

Q.29 Which test signal is used to determine the steady-state error of a system?

- Ans ☐ 1. Impulse Signal
☒ 2. Step Signal
☐ 3. Sinusoidal Signal
☐ 4. Ramp Signal

Question ID : 630680485785
Option 1 ID : 6306801897355
Option 2 ID : 6306801897357
Option 3 ID : 6306801897358
Option 4 ID : 6306801897356
Status : Not Answered
Chosen Option : --

Q.30 Which of the following is the correct formula of string efficiency?

- Ans ☐ 1. String Efficiency = voltage across the whole string/(number of discs in string × the voltage across the disc farthest to the conductor)
☒ 2. String Efficiency = voltage across the whole string/(number of discs in string × the voltage across the disc nearest to the conductor)
☐ 3. String Efficiency = (voltage across the whole string × number of discs in string) /the voltage across the disc nearest to the conductor
☐ 4. String Efficiency = (voltage across the whole string × number of discs in string) /the voltage across the disc farthest to the conductor

Question ID : 630680485791
Option 1 ID : 6306801897380
Option 2 ID : 6306801897379
Option 3 ID : 6306801897381
Option 4 ID : 6306801897382
Status : Answered
Chosen Option : 2

Q.31 In a three-phase system, RYB sequence is also known as _____.

- Ans ☒ 1. Positive sequence
 ☐ 2. Zero sequence
 ☐ 3. Both positive and negative sequence.
 ☐ 4. Negative sequence

Question ID : 630680485696
Option 1 ID : 6306801896999
Option 2 ID : 6306801897001
Option 3 ID : 6306801897002
Option 4 ID : 6306801897000
Status : Answered
Chosen Option : 1

Q.32 In an overcurrent relay, the time of operation is inversely proportional to _____.

- Ans ☐ 1. The cube of the current
 ☒ 2. The square of the current
 ☐ 3. The frequency
 ☐ 4. The voltage

Question ID : 630680485807
Option 1 ID : 6306801897444
Option 2 ID : 6306801897443
Option 3 ID : 6306801897446
Option 4 ID : 6306801897445
Status : Answered
Chosen Option : 2

Q.33 The slip of an induction motor is 0 when the motor is:

- Ans ☐ 1. Overloaded
 ☐ 2. At standstill
 ☒ 3. Running at synchronous speed
 ☐ 4. Running at maximum torque

Question ID : 630680485729
Option 1 ID : 6306801897134
Option 2 ID : 6306801897131
Option 3 ID : 6306801897132
Option 4 ID : 6306801897133
Status : Answered
Chosen Option : 3

Q.34 The primary purpose of a current transformer (CT) is to _____.

- Ans ☐ 1. Step up voltage
 ☐ 2. Step down voltage
 ☒ 3. Convert high current to a lower value
 ☐ 4. Convert low current to a higher value

Question ID : 630680485712
Option 1 ID : 6306801897063
Option 2 ID : 6306801897064
Option 3 ID : 6306801897065
Option 4 ID : 6306801897066
Status : Answered
Chosen Option : 3

Q.35 For parallel operation of transformers, which of the following conditions is NOT essential?

- Ans ☒ 1. Same voltage ratio
☒ 2. Same kVA rating
☒ 3. Same frequency
☒ 4. Same polarity

Question ID : 630680485728
Option 1 ID : 6306801897127
Option 2 ID : 6306801897128
Option 3 ID : 6306801897129
Option 4 ID : 6306801897130
Status : Answered
Chosen Option : 2

Q.36 In transmission lines, sag is least affected by:

- Ans ☒ 1. Ice loading
☒ 2. Span length
☒ 3. Weight of the conductor
☒ 4. Colour of the conductor

Question ID : 630680485792
Option 1 ID : 6306801897385
Option 2 ID : 6306801897384
Option 3 ID : 6306801897383
Option 4 ID : 6306801897386
Status : Answered
Chosen Option : 4

Q.37 The principle on which a DC generator operates is _____.

- Ans ☒ 1. Ampere's law
☒ 2. Kirchhoff's voltage law
☒ 3. Faraday's law of electromagnetic induction
☒ 4. Ohm's law

Question ID : 630680485713
Option 1 ID : 6306801897069
Option 2 ID : 6306801897070
Option 3 ID : 6306801897067
Option 4 ID : 6306801897068
Status : Answered
Chosen Option : 3

Q.38 A chain reaction in a nuclear reactor is sustained by _____.

- Ans ☒ 1. Fast neutrons
☒ 2. Protons
☒ 3. Electrons
☒ 4. Slow neutrons

Question ID : 630680485744
Option 1 ID : 6306801897191
Option 2 ID : 6306801897193
Option 3 ID : 6306801897194
Option 4 ID : 6306801897192
Status : Answered
Chosen Option : 4

Q.39 The e.m.f. generated in a DC generator can be increased by:

- Ans ☒ 1. Decreasing the number of turns in the coil
☒ 2. Decreasing the flux per pole
☒ 3. Using a smaller coil
☒ 4. Increasing the speed of the generator

Question ID : 630680485714

Option 1 ID : 6306801897071

Option 2 ID : 6306801897072

Option 3 ID : 6306801897074

Option 4 ID : 6306801897073

Status : Answered

Chosen Option : 4

Q.40 In a DC motor, the supply voltage is equal to:

- Ans ☒ 1. Back e.m.f. minus armature drop
☒ 2. Back e.m.f. plus armature drop
☒ 3. Armature drop divided by back e.m.f.
☒ 4. Armature drop minus back e.m.f.

Question ID : 630680485717

Option 1 ID : 6306801897083

Option 2 ID : 6306801897084

Option 3 ID : 6306801897086

Option 4 ID : 6306801897085

Status : Answered

Chosen Option : 2

Q.41 The primary advantage of using SF6 gas in circuit breakers is its _____.

- Ans ☒ 1. High dielectric strength
☒ 2. Low cost
☒ 3. Non-flammability
☒ 4. Non-toxicity

Question ID : 630680485802

Option 1 ID : 6306801897424

Option 2 ID : 6306801897423

Option 3 ID : 6306801897425

Option 4 ID : 6306801897426

Status : Answered

Chosen Option : 1

Q.42 Which type of motor is specifically designed for precise control of angular position?

- Ans ☒ 1. Servomotor
☒ 2. DC Motor
☒ 3. Synchronous Motor
☒ 4. Induction Motor

Question ID : 630680485783

Option 1 ID : 6306801897348

Option 2 ID : 6306801897350

Option 3 ID : 6306801897349

Option 4 ID : 6306801897347

Status : Answered

Chosen Option : 1

Q.43 In the armature control method, the speed of the DC motor:

- Ans ☒ 1. Increases with increased resistance
☒ 2. Decreases with increased resistance
☒ 3. Remains constant with increased resistance
☒ 4. Becomes zero with increased resistance

Question ID : 630680485719
Option 1 ID : 6306801897091
Option 2 ID : 6306801897092
Option 3 ID : 6306801897093
Option 4 ID : 6306801897094
Status : Answered
Chosen Option : 1

Q.44 Diversity factor is always _____.

- Ans ☒ 1. Greater than one
☒ 2. Zero
☒ 3. Less than one
☒ 4. Equal to one

Question ID : 630680485753
Option 1 ID : 6306801897229
Option 2 ID : 6306801897230
Option 3 ID : 6306801897227
Option 4 ID : 6306801897228
Status : Answered
Chosen Option : 1

Q.45 Which component in a CSP plant focuses sunlight onto a target?

- Ans ☒ 1. Photovoltaic cell
☒ 2. Inverter
☒ 3. Mirror or lens
☒ 4. Battery storage

Question ID : 630680485748
Option 1 ID : 6306801897207
Option 2 ID : 6306801897208
Option 3 ID : 6306801897209
Option 4 ID : 6306801897210
Status : Answered
Chosen Option : 3

Q.46 The primary purpose of a surge tank in a hydroelectric power plant is to _____.

- Ans ☒ 1. Increase the efficiency of the turbine
☒ 2. Store water for future use
☒ 3. Generate additional power
☒ 4. Reduce water hammer effect in the penstock

Question ID : 630680485747
Option 1 ID : 6306801897205
Option 2 ID : 6306801897203
Option 3 ID : 6306801897206
Option 4 ID : 6306801897204
Status : Answered
Chosen Option : 4

Q.47 For maximum power transfer in AC circuits, the load impedance should be _____.

- Ans
- ☒ 1. Equal to source impedance
 - ☒ 2. Half of source impedance
 - ☒ 3. Conjugate of source impedance
 - ☒ 4. Double of source impedance

Question ID : 630680485693
Option 1 ID : 6306801896987
Option 2 ID : 6306801896989
Option 3 ID : 6306801896988
Option 4 ID : 6306801896990
Status : Answered
Chosen Option : 3

Q.48 Francis turbines are best suited for _____.

- Ans
- ☒ 1. Very high head and very low flow rates
 - ☒ 2. Medium head and medium flow rates
 - ☒ 3. High head and low flow rates
 - ☒ 4. Low head and high flow rates

Question ID : 630680485746
Option 1 ID : 6306801897202
Option 2 ID : 6306801897201
Option 3 ID : 6306801897200
Option 4 ID : 6306801897199
Status : Answered
Chosen Option : 2

Q.49 In industrial installations, what design consideration is vital for machinery?

- Ans
- ☒ 1. Adequate power supply
 - ☒ 2. Colour coordination
 - ☒ 3. Proximity to windows
 - ☒ 4. Distance from the main gate

Question ID : 630680485768
Option 1 ID : 6306801897289
Option 2 ID : 6306801897290
Option 3 ID : 6306801897287
Option 4 ID : 6306801897288
Status : Answered
Chosen Option : 1

Q.50 For an application requiring high starting torque and low starting current, which type of motor is most suitable?

- Ans
- ☒ 1. Capacitor start motor
 - ☒ 2. Synchronous motor
 - ☒ 3. Slip ring induction motor
 - ☒ 4. Squirrel cage induction motor

Question ID : 630680485733
Option 1 ID : 6306801897149
Option 2 ID : 6306801897147
Option 3 ID : 6306801897148
Option 4 ID : 6306801897150
Status : Answered
Chosen Option : 3

Q.51 Which principle ensures safety against electric shock during electrical installations?

- Ans ☒ 1. Insulation of live parts
- ☐ 2. Keeping a first aid kit nearby
- ☐ 3. Wearing a helmet during installations
- ☐ 4. Using a flashlight in dark areas

Question ID : 630680485766
Option 1 ID : 6306801897279
Option 2 ID : 6306801897282
Option 3 ID : 6306801897280
Option 4 ID : 6306801897281
Status : Answered
Chosen Option : 1

Q.52 The process by which water vapor in the air is changed into liquid water is called _____.

- Ans ☐ 1. Precipitation
- ☐ 2. Evaporation
- ☐ 3. Infiltration
- ☒ 4. Condensation

Question ID : 630680485745
Option 1 ID : 6306801897197
Option 2 ID : 6306801897195
Option 3 ID : 6306801897198
Option 4 ID : 6306801897196
Status : Answered
Chosen Option : 4

Q.53 Which technique involves combining blocks in series or parallel to simplify a block diagram?

- Ans ☐ 1. Mason's Gain Formula
- ☒ 2. Block Diagram Reduction
- ☐ 3. Nyquist Stability Criterion
- ☐ 4. Routh-Hurwitz Criterion

Question ID : 630680485782
Option 1 ID : 6306801897343
Option 2 ID : 6306801897345
Option 3 ID : 6306801897346
Option 4 ID : 6306801897344
Status : Answered
Chosen Option : 2

Q.54 Instrument systems can be classified based on _____.

- Ans ☒ 1. Function and response
- ☐ 2. Size
- ☐ 3. Colour
- ☐ 4. Weight

Question ID : 630680485701
Option 1 ID : 6306801897021
Option 2 ID : 6306801897020
Option 3 ID : 6306801897019
Option 4 ID : 6306801897022
Status : Answered
Chosen Option : 1

Q.55 What are the ABCD constants used for in the context of a short transmission line?

- Ans ☒ 1. To analyze steady-state conditions
- ☐ 2. To calculate capacitance
- ☐ 3. To determine the temperature of the line
- ☐ 4. To calculate inductance

Question ID : 630680485758
Option 1 ID : 6306801897249
Option 2 ID : 6306801897247
Option 3 ID : 6306801897250
Option 4 ID : 6306801897248
Status : Not Answered
Chosen Option : --

Q.56 The voltage transformation ratio of a transformer is the ratio of:

- Ans ☐ 1. Secondary to primary voltage
- ☒ 2. Primary to secondary voltage
- ☐ 3. Secondary to primary resistance
- ☐ 4. Primary to secondary resistance

Question ID : 630680485724
Option 1 ID : 6306801897112
Option 2 ID : 6306801897113
Option 3 ID : 6306801897114
Option 4 ID : 6306801897111
Status : Answered
Chosen Option : 2

Q.57 Which method is commonly used for the measurement of low resistances?

- Ans ☐ 1. Wheatstone bridge method
- ☐ 2. Megger method
- ☐ 3. Ohm's law method
- ☒ 4. Kelvin's double bridge method

Question ID : 630680485707
Option 1 ID : 6306801897045
Option 2 ID : 6306801897046
Option 3 ID : 6306801897043
Option 4 ID : 6306801897044
Status : Answered
Chosen Option : 4

Q.58 What is the primary factor affecting the inductance of a transmission line?

- Ans ☒ 1. Conductor material
- ☐ 2. Length of the transmission line
- ☐ 3. Frequency of the signal
- ☐ 4. Temperature of the surrounding environment

Question ID : 630680485755
Option 1 ID : 6306801897236
Option 2 ID : 6306801897237
Option 3 ID : 6306801897235
Option 4 ID : 6306801897238
Status : Answered
Chosen Option : 2

Q.59 The primary function of an ELCB (Earth leakage circuit breaker) is to detect _____.

- Ans ☒ 1. Overvoltage
☒ 2. Phase imbalance
☒ 3. Overcurrent
☒ 4. Earth leakage current

Question ID : 630680485804
Option 1 ID : 6306801897432
Option 2 ID : 6306801897434
Option 3 ID : 6306801897431
Option 4 ID : 6306801897433
Status : Answered
Chosen Option : 4

Q.60 Wind power density is directly proportional to _____.

- Ans ☒ 1. Wind speed
☒ 2. Wind speed cubed
☒ 3. Wind speed squared
☒ 4. Square root of wind speed

Question ID : 630680485750
Option 1 ID : 6306801897215
Option 2 ID : 6306801897217
Option 3 ID : 6306801897216
Option 4 ID : 6306801897218
Status : Not Answered
Chosen Option : --

Q.61 When selecting an MCCB (Molded Case Circuit Breaker) for motors, which factor is crucial?

- Ans ☒ 1. Motor weight
☒ 2. Brand reputation
☒ 3. Colour of MCCB
☒ 4. Motor starting current

Question ID : 630680485803
Option 1 ID : 6306801897430
Option 2 ID : 6306801897428
Option 3 ID : 6306801897427
Option 4 ID : 6306801897429
Status : Answered
Chosen Option : 4

Q.62 In circuit analysis, converting a voltage source in series with a resistance to a current source in parallel with the same resistance is known as _____.

- Ans ☒ 1. Parallel to series resistance transformation
☒ 2. Voltage to current source transformation
☒ 3. Resistor to inductor transformation
☒ 4. Current to voltage source transformation

Question ID : 630680485688
Option 1 ID : 6306801896969
Option 2 ID : 6306801896967
Option 3 ID : 6306801896970
Option 4 ID : 6306801896968
Status : Answered
Chosen Option : 2

Q.63 In a control system, if all poles lie on the left side of the s-plane, the system is:

- Ans ☒ 1. Stable
☐ 2. Oscillatory
☐ 3. Unstable
☐ 4. Marginally stable

Question ID : 630680485781
Option 1 ID : 6306801897341
Option 2 ID : 6306801897342
Option 3 ID : 6306801897339
Option 4 ID : 6306801897340
Status : Not Answered
Chosen Option : --

Q.64 How is the voltage regulation of a short transmission line typically determined?

- Ans ☒ 1. By considering the line's impedance
☐ 2. By analyzing transient conditions
☐ 3. By measuring the conductor diameter
☐ 4. By measuring the line length

Question ID : 630680485759
Option 1 ID : 6306801897253
Option 2 ID : 6306801897252
Option 3 ID : 6306801897254
Option 4 ID : 6306801897251
Status : Not Answered
Chosen Option : --

Q.65 Which characteristic of an instrument defines its behaviour during rapid changes in the measurand?

- Ans ☐ 1. Precision
☐ 2. Static
☒ 3. Dynamic
☐ 4. Accuracy

Question ID : 630680485702
Option 1 ID : 6306801897026
Option 2 ID : 6306801897023
Option 3 ID : 6306801897024
Option 4 ID : 6306801897025
Status : Not Answered
Chosen Option : --

Q.66 When reducing a block diagram, which of the following is NOT a basic configuration?

- Ans ☐ 1. Series Configuration
☐ 2. Feedback Configuration
☒ 3. Diagonal Configuration
☐ 4. Parallel Configuration

Question ID : 630680485787
Option 1 ID : 6306801897363
Option 2 ID : 6306801897365
Option 3 ID : 6306801897366
Option 4 ID : 6306801897364
Status : Answered
Chosen Option : 3

Q.67 The pentagonal OHE centenary construction is primarily used for _____.

- Ans ☒ 1. Improving the mechanical strength
- ☐ 2. Increasing the conductivity
- ☐ 3. Enhancing the aesthetic appeal
- ☐ 4. Reducing the weight of the structure

Question ID : 630680485794
Option 1 ID : 6306801897393
Option 2 ID : 6306801897394
Option 3 ID : 6306801897392
Option 4 ID : 6306801897391
Status : Not Answered
Chosen Option : --

Q.68 Wound rotor induction generators are primarily used in wind turbines because they _____.

- Ans ☐ 1. Reduce the overall cost
- ☐ 2. Make the turbine noiseless
- ☐ 3. Increase the wind turbine size
- ☒ 4. Allow variable speed operation

Question ID : 630680485751
Option 1 ID : 6306801897219
Option 2 ID : 6306801897222
Option 3 ID : 6306801897221
Option 4 ID : 6306801897220
Status : Answered
Chosen Option : 4

Q.69 For a sinusoidal waveform, the RMS value is approximately what fraction of the peak value?

- Ans ☐ 1. 0.5
- ☒ 2. 0.707
- ☐ 3. 1
- ☐ 4. 0.9

Question ID : 630680485774
Option 1 ID : 6306801897311
Option 2 ID : 6306801897312
Option 3 ID : 6306801897314
Option 4 ID : 6306801897313
Status : Answered
Chosen Option : 2

Q.70 Which Boolean operation is represented by the multiplication of two binary variables?

- Ans ☐ 1. NOT operation
- ☐ 2. XOR operation
- ☐ 3. OR operation
- ☒ 4. AND operation

Question ID : 630680485779
Option 1 ID : 6306801897333
Option 2 ID : 6306801897334
Option 3 ID : 6306801897331
Option 4 ID : 6306801897332
Status : Answered
Chosen Option : 4

Q.71 What is a primary consideration in the design of street lighting?

- Ans
- ☐ 1. Colour of the light
 - ☐ 2. Aesthetic appeal
 - ☐ 3. Height of nearby buildings
 - ☒ 4. Distance between poles

Question ID : 630680485769
Option 1 ID : 6306801897293
Option 2 ID : 6306801897291
Option 3 ID : 6306801897294
Option 4 ID : 6306801897292
Status : Answered
Chosen Option : 4

Q.72 A differential relay operates when the difference between the currents in its two coils exceeds?

- Ans
- ☒ 1. A preset value
 - ☐ 2. 50% of rated current
 - ☐ 3. 100% of rated current
 - ☐ 4. Zero

Question ID : 630680485806
Option 1 ID : 6306801897439
Option 2 ID : 6306801897440
Option 3 ID : 6306801897441
Option 4 ID : 6306801897442
Status : Answered
Chosen Option : 1

Q.73 What is the formula for calculating the transmission efficiency of short transmission lines?

- Ans
- ☐ 1. Efficiency = $1 - (\text{Received power} / \text{Transmitted power})$
 - ☐ 2. Efficiency = $(\text{Transmitted power} - \text{Received power}) / \text{Transmitted power}$
 - ☐ 3. Efficiency = $\text{Transmitted power} / \text{Received power}$
 - ☒ 4. Efficiency = $(\text{Received power} / \text{Transmitted power}) \times 100$

Question ID : 630680485760
Option 1 ID : 6306801897258
Option 2 ID : 6306801897257
Option 3 ID : 6306801897256
Option 4 ID : 6306801897255
Status : Answered
Chosen Option : 4

Q.74 The rectifier type AC voltmeter is used to measure _____.

- Ans
- ☐ 1. RMS value
 - ☐ 2. Peak-to-peak value
 - ☒ 3. Average value
 - ☐ 4. Peak value

Question ID : 630680485711
Option 1 ID : 6306801897060
Option 2 ID : 6306801897062
Option 3 ID : 6306801897061
Option 4 ID : 6306801897059
Status : Answered
Chosen Option : 1

Q.75 In a water-tube boiler, water flows inside the _____.

- Ans
- ☐ 1. Combustion chamber
 - ☐ 2. Tubes and cold gases surround them
 - ☒ 3. Tubes and hot gases surround them
 - ☐ 4. Outer shell only

Question ID : 630680485740
Option 1 ID : 6306801897175
Option 2 ID : 6306801897177
Option 3 ID : 6306801897176
Option 4 ID : 6306801897178
Status : Answered
Chosen Option : 3

Q.76 What is the result of the inverse Laplace transform of $F(s) = 1/s$?

- Ans
- ☐ 1. e^{-at}
 - ☒ 2. $u(t)$
 - ☐ 3. $\sin(at)$
 - ☐ 4. $\cos(at)$

Question ID : 630680485700
Option 1 ID : 6306801897016
Option 2 ID : 6306801897015
Option 3 ID : 6306801897017
Option 4 ID : 6306801897018
Status : Answered
Chosen Option : 2

Q.77 In a power system, reactive power is primarily due to _____.

- Ans
- ☐ 1. Capacitive loads
 - ☐ 2. Purely active loads
 - ☒ 3. Inductive loads
 - ☐ 4. Resistive loads

Question ID : 630680485705
Option 1 ID : 6306801897036
Option 2 ID : 6306801897038
Option 3 ID : 6306801897037
Option 4 ID : 6306801897035
Status : Answered
Chosen Option : 3

Q.78 In a Star (Y) connected system, if phase voltage is V_p and line voltage is V_l , which of the following relationships is correct?

- Ans
- ☐ 1. $V_p = V_l$
 - ☒ 2. $V_p = V_l / \sqrt{3}$
 - ☐ 3. $V_p = V_l \times \sqrt{3}$
 - ☐ 4. $V_p = 3 \times V_l$

Question ID : 630680485800
Option 1 ID : 6306801897417
Option 2 ID : 6306801897415
Option 3 ID : 6306801897416
Option 4 ID : 6306801897418
Status : Answered
Chosen Option : 2

Q.79 Which of the following is NOT a typical loss in a synchronous motor?

- Ans ☒ 1. Capacitive loss
- ☐ 2. Friction loss
- ☐ 3. Copper loss
- ☐ 4. Iron loss

Question ID : 630680485738
Option 1 ID : 6306801897170
Option 2 ID : 6306801897169
Option 3 ID : 6306801897167
Option 4 ID : 6306801897168
Status : Answered
Chosen Option : 1

Q.80 The Schering bridge is used to measure _____.

- Ans ☒ 1. Capacitance
- ☐ 2. Frequency
- ☐ 3. Resistance
- ☐ 4. Inductance

Question ID : 630680485709
Option 1 ID : 6306801897053
Option 2 ID : 6306801897054
Option 3 ID : 6306801897051
Option 4 ID : 6306801897052
Status : Answered
Chosen Option : 1

Q.81 Which of the following describes the primary difference between a JFET (Junction Field-Effect Transistor) and a MOSFET (Metal-Oxide-Semiconductor Field-Effect Transistor)?

- Ans ☒ 1. Gate is voltage-controlled and no current flows through it in a MOSFET
- ☐ 2. Gate is voltage-controlled and current flows through it in a MOSFET
- ☐ 3. MOSFETs are unipolar devices while JFETs are bipolar
- ☐ 4. JFETs use a PN-junction for gating, while MOSFETs use a metal-semiconductor junction

Question ID : 630680485771
Option 1 ID : 6306801897299
Option 2 ID : 6306801897300
Option 3 ID : 6306801897301
Option 4 ID : 6306801897302
Status : Answered
Chosen Option : 4

Q.82 Electronic energy meters provide an advantage of _____.

- Ans ☐ 1. High power consumption
- ☒ 2. High accuracy and reliability
- ☐ 3. Being bulky
- ☐ 4. Having moving parts

Question ID : 630680485710
Option 1 ID : 6306801897057
Option 2 ID : 6306801897058
Option 3 ID : 6306801897055
Option 4 ID : 6306801897056
Status : Answered
Chosen Option : 2

Q.83 The equivalent resistance of a transformer is used to calculate:

- Ans ☒ 1. Power factor
☒ 2. Copper losses
☒ 3. Core losses
☒ 4. Efficiency

Question ID : 630680485725
Option 1 ID : 6306801897118
Option 2 ID : 6306801897116
Option 3 ID : 6306801897115
Option 4 ID : 6306801897117
Status : Answered
Chosen Option : 2

Q.84 The form factor of an AC waveform is defined as the ratio of _____.

- Ans ☒ 1. RMS value to the average value
☒ 2. RMS value to the peak value
☒ 3. Peak value to the RMS value
☒ 4. Average value to the RMS value

Question ID : 630680485801
Option 1 ID : 6306801897419
Option 2 ID : 6306801897422
Option 3 ID : 6306801897421
Option 4 ID : 6306801897420
Status : Answered
Chosen Option : 1

Q.85 When calculating the sag in a transmission line, which factor is considered?

- Ans ☒ 1. Conductor material
☒ 2. Temperature of the conductor
☒ 3. Atmospheric pressure
☒ 4. Line length

Question ID : 630680485762
Option 1 ID : 6306801897263
Option 2 ID : 6306801897266
Option 3 ID : 6306801897265
Option 4 ID : 6306801897264
Status : Answered
Chosen Option : 2

Q.86 The load angle in a synchronous motor indicates the angle between _____.

- Ans ☒ 1. Rotor and stator magnetic fields
☒ 2. Stator magnetic field and rotor current
☒ 3. Supply voltage and rotor current
☒ 4. Rotor magnetic field and supply voltage

Question ID : 630680485736
Option 1 ID : 6306801897159
Option 2 ID : 6306801897162
Option 3 ID : 6306801897160
Option 4 ID : 6306801897161
Status : Answered
Chosen Option : 1

Q.87 Armature reaction in a DC generator primarily affects:

- Ans
- ☐ 1. Power factor
 - ☐ 2. Efficiency
 - ☐ 3. Speed of the generator
 - ☒ 4. Generated voltage

Question ID : 630680485715
Option 1 ID : 6306801897077
Option 2 ID : 6306801897078
Option 3 ID : 6306801897076
Option 4 ID : 6306801897075
Status : Not Answered
Chosen Option : --

Q.88 The time required for half of the radioactive atoms in a sample to decay is called

- Ans
- ☒ 1. Half-life
 - ☐ 2. Radioactive decay
 - ☐ 3. Full-life
 - ☐ 4. Decay constant

Question ID : 630680485742
Option 1 ID : 6306801897185
Option 2 ID : 6306801897184
Option 3 ID : 6306801897186
Option 4 ID : 6306801897183
Status : Answered
Chosen Option : 1

Q.89 Which factor is essential in the design of HT LT overhead lines?

- Ans
- ☐ 1. Colour of insulators
 - ☐ 2. Proximity to birds' nests
 - ☒ 3. Distance from the ground
 - ☐ 4. Nearby vegetation type

Question ID : 630680485770
Option 1 ID : 6306801897297
Option 2 ID : 6306801897295
Option 3 ID : 6306801897296
Option 4 ID : 6306801897298
Status : Answered
Chosen Option : 3

Q.90 The order of a system is determined by:

- Ans
- ☐ 1. Number of input signals
 - ☐ 2. Number of output signals
 - ☒ 3. Highest power of 's' in its transfer function
 - ☐ 4. Number of feedback loops

Question ID : 630680485786
Option 1 ID : 6306801897361
Option 2 ID : 6306801897362
Option 3 ID : 6306801897360
Option 4 ID : 6306801897359
Status : Answered
Chosen Option : 3

Q.91 A purely resistive AC circuit has a power factor of _____.

- Ans
- ☒ 1. 0.5
 - ☒ 2. 0
 - ☒ 3. Infinite
 - ☒ 4. 1

Question ID : 630680485695
Option 1 ID : 6306801896996
Option 2 ID : 6306801896995
Option 3 ID : 6306801896998
Option 4 ID : 6306801896997
Status : Answered
Chosen Option : 4

Q.92 Which property of Laplace Transform is used to solve differential equations?

- Ans
- ☒ 1. Linearity
 - ☒ 2. Frequency Shifting
 - ☒ 3. Time Shifting
 - ☒ 4. Initial Value

Question ID : 630680485699
Option 1 ID : 6306801897011
Option 2 ID : 6306801897013
Option 3 ID : 6306801897012
Option 4 ID : 6306801897014
Status : Answered
Chosen Option : 1

Q.93 PMMC (Permanent magnet moving coil) instruments are suitable for _____.

- Ans
- ☒ 1. Both AC and DC
 - ☒ 2. DC measurements
 - ☒ 3. AC measurements
 - ☒ 4. Neither AC nor DC

Question ID : 630680485706
Option 1 ID : 6306801897041
Option 2 ID : 6306801897040
Option 3 ID : 6306801897039
Option 4 ID : 6306801897042
Status : Answered
Chosen Option : 2

Q.94 The overall efficiency of a steam power plant is defined as the ratio of _____.

- Ans
- ☒ 1. Heat energy output to the electrical energy input
 - ☒ 2. Mechanical energy output to the heat energy input
 - ☒ 3. Electrical energy output to the mechanical energy input
 - ☒ 4. Electrical energy output to the heat energy input

Question ID : 630680485739
Option 1 ID : 6306801897174
Option 2 ID : 6306801897171
Option 3 ID : 6306801897172
Option 4 ID : 6306801897173
Status : Answered
Chosen Option : 4

Q.95 Plant capacity factor is the ratio of _____.

- Ans ☒ 1. Actual energy to the average energy
- ☒ 2. Actual energy produced to the maximum possible energy
- ☒ 3. Maximum possible energy to the actual energy produced
- ☒ 4. Average energy to the actual energy

Question ID : 630680485754
Option 1 ID : 6306801897233
Option 2 ID : 6306801897231
Option 3 ID : 6306801897232
Option 4 ID : 6306801897234
Status : Answered
Chosen Option : 4

Q.96 In the four quadrant operation of a three-phase induction motor, consider the following scenarios:

- I. Motor operates in the forward direction with motoring torque.
II. Motor operates in the reverse direction with regenerative braking.
III. Motor operates in the forward direction with regenerative braking.
IV. Motor operates in the reverse direction with motoring torque.

Which of the following correctly represents the third quadrant of operation?

- Ans ☒ 1. II
- ☒ 2. IV
- ☒ 3. III
- ☒ 4. I

Question ID : 630680485731
Option 1 ID : 6306801897140
Option 2 ID : 6306801897142
Option 3 ID : 6306801897141
Option 4 ID : 6306801897139
Status : Answered
Chosen Option : 1

Q.97 Which organization sets the standards for illumination levels in various spaces?

- Ans ☒ 1. ISO
- ☒ 2. IEEE
- ☒ 3. IESNA
- ☒ 4. IEC

Question ID : 630680485797
Option 1 ID : 6306801897405
Option 2 ID : 6306801897403
Option 3 ID : 6306801897404
Option 4 ID : 6306801897406
Status : Answered
Chosen Option : 2

Q.98 Which type of error is caused by the aging of an instrument?

- Ans ☒ 1. Gross error
☒ 2. Absolute error
☒ 3. Systematic error
☒ 4. Random error

Question ID : 630680485703
Option 1 ID : 6306801897027
Option 2 ID : 6306801897030
Option 3 ID : 6306801897028
Option 4 ID : 6306801897029
Status : Not Answered
Chosen Option : --

Q.99 In electric traction, the purpose of sectioning is to _____.

- Ans ☒ 1. Reduce the current flow
☒ 2. Divide the overhead equipment into sections
☒ 3. Increase the voltage
☒ 4. Improve the efficiency

Question ID : 630680485793
Option 1 ID : 6306801897389
Option 2 ID : 6306801897388
Option 3 ID : 6306801897387
Option 4 ID : 6306801897390
Status : Answered
Chosen Option : 2

Q.100 According to Faraday's first law of electromagnetic induction, the induced electromotive force in any closed circuit is equal to:

- Ans ☒ 1. The total magnetic flux through the circuit
☒ 2. The current flowing through the circuit
☒ 3. The rate of change of the magnetic flux through the circuit
☒ 4. The resistance of the circuit

Question ID : 630680485799
Option 1 ID : 6306801897412
Option 2 ID : 6306801897414
Option 3 ID : 6306801897411
Option 4 ID : 6306801897413
Status : Answered
Chosen Option : 3

Q.101 In a medium transmission line, if the received power is 800 kW and the transmitted power is 850 kW, what is the transmission efficiency?

- Ans ☒ 1. 55.29%
☒ 2. 94.59%
☒ 3. 94.12%
☒ 4. 5.88%

Question ID : 630680485761
Option 1 ID : 6306801897262
Option 2 ID : 6306801897260
Option 3 ID : 6306801897259
Option 4 ID : 6306801897261
Status : Answered
Chosen Option : 3

Q.102 What is the purpose of calculating string efficiency in transmission lines?

- Ans
- ☒ 1. To minimize line losses
 - ☒ 2. To determine the capacitance
 - ☒ 3. To optimize conductor material
 - ☒ 4. To calculate inductance

Question ID : 630680485763
Option 1 ID : 6306801897268
Option 2 ID : 6306801897270
Option 3 ID : 6306801897267
Option 4 ID : 6306801897269
Status : Answered
Chosen Option : 2

Q.103 In a two-port network, the open-circuit impedance parameter Z11 represents _____.

- Ans
- ☒ 1. Input impedance with output open-circuited
 - ☒ 2. Output impedance with input open-circuited
 - ☒ 3. Transfer impedance from input to output
 - ☒ 4. Transfer impedance from output to input

Question ID : 630680485697
Option 1 ID : 6306801897003
Option 2 ID : 6306801897004
Option 3 ID : 6306801897005
Option 4 ID : 6306801897006
Status : Answered
Chosen Option : 1

Q.104 Why is transposition of conductors necessary in transmission lines?

- Ans
- ☒ 1. To reduce the inductance of the line
 - ☒ 2. To improve the efficiency of the line
 - ☒ 3. To increase the capacitance of the line
 - ☒ 4. To increase line losses

Question ID : 630680485757
Option 1 ID : 6306801897245
Option 2 ID : 6306801897244
Option 3 ID : 6306801897246
Option 4 ID : 6306801897243
Status : Answered
Chosen Option : 1

Q.105 Which diode is specifically designed to operate in the reverse breakdown region?

- Ans
- ☒ 1. Zener Diode
 - ☒ 2. Tunnel Diode
 - ☒ 3. Schottky Diode
 - ☒ 4. Light Emitting Diode

Question ID : 630680485773
Option 1 ID : 6306801897307
Option 2 ID : 6306801897310
Option 3 ID : 6306801897309
Option 4 ID : 6306801897308
Status : Answered
Chosen Option : 1

Q.106 A brushless DC motor operates primarily on the principle of:

- Ans
- ☒ 1. Commutation by brushes
 - ☐ 2. Synchronous operation
 - ☐ 3. Variable reluctance
 - ☒ 4. Electronic commutation

Question ID : 630680485720
Option 1 ID : 6306801897095
Option 2 ID : 6306801897098
Option 3 ID : 6306801897097
Option 4 ID : 6306801897096
Status : Answered
Chosen Option : 2

Q.107 The primary purpose of a DC motor starter is to:

- Ans
- ☒ 1. Limit the starting current
 - ☐ 2. Increase the motor speed
 - ☐ 3. Improve efficiency
 - ☐ 4. Enhance power factor

Question ID : 630680485718
Option 1 ID : 6306801897088
Option 2 ID : 6306801897087
Option 3 ID : 6306801897089
Option 4 ID : 6306801897090
Status : Answered
Chosen Option : 1

Q.108 Which transformation is used to simplify a three-resistor network?

- A) Star to Delta
B) Delta to Star

- Ans
- ☒ 1. Only B
 - ☐ 2. Neither A nor B
 - ☐ 3. Both A and B
 - ☐ 4. Only A

Question ID : 630680485689
Option 1 ID : 6306801896972
Option 2 ID : 6306801896974
Option 3 ID : 6306801896973
Option 4 ID : 6306801896971
Status : Not Answered
Chosen Option : --

Q.109 The dynamometer type wattmeter operates on the principle of _____.

- Ans
- ☐ 1. Mutual induction
 - ☒ 2. Electromagnetic induction
 - ☐ 3. Electrostatic induction
 - ☐ 4. Self induction

Question ID : 630680485704
Option 1 ID : 6306801897031
Option 2 ID : 6306801897033
Option 3 ID : 6306801897034
Option 4 ID : 6306801897032
Status : Not Answered
Chosen Option : --

Q.110 In the four quadrant operation of a 3-phase induction motor, the fourth quadrant represents:

- Ans
- ☒ 1. Motoring with forward torque
 - ☒ 2. Generating with forward torque
 - ☒ 3. Generating with reverse torque
 - ☒ 4. Motoring with reverse torque

Question ID : 630680485732
Option 1 ID : 6306801897145
Option 2 ID : 6306801897144
Option 3 ID : 6306801897146
Option 4 ID : 6306801897143
Status : Not Answered
Chosen Option : --

Q.111 Which type of FET is normally ON when the gate-source voltage is zero?

- Ans
- ☒ 1. Depletion-mode MOSFET
 - ☒ 2. JFET
 - ☒ 3. Enhancement-mode MOSFET
 - ☒ 4. MOSFET

Question ID : 630680485772
Option 1 ID : 6306801897306
Option 2 ID : 6306801897303
Option 3 ID : 6306801897305
Option 4 ID : 6306801897304
Status : Answered
Chosen Option : 3

Q.112 What is a crucial factor to consider when preparing a detailed electrical estimate?

- Ans
- ☒ 1. Office location
 - ☒ 2. Load requirements
 - ☒ 3. Colour of wires
 - ☒ 4. Brand of equipment

Question ID : 630680485767
Option 1 ID : 6306801897286
Option 2 ID : 6306801897285
Option 3 ID : 6306801897283
Option 4 ID : 6306801897284
Status : Not Answered
Chosen Option : --

Q.113 The demand factor is the ratio of _____.

- Ans
- ☒ 1. Maximum demand to connected load
 - ☒ 2. Connected load to maximum demand
 - ☒ 3. Connected load to average load
 - ☒ 4. Average load to connected load

Question ID : 630680485752
Option 1 ID : 6306801897223
Option 2 ID : 6306801897224
Option 3 ID : 6306801897226
Option 4 ID : 6306801897225
Status : Answered
Chosen Option : 1

Q.114 In a parallel RLC circuit operating at a frequency other than its resonant frequency, which of the following statements is true?

- Ans ☒ 1. The total current is either leading or lagging the voltage, depending on the values of R, L, and C.
- ☐ 2. The total current is always in phase with the voltage.
- ☐ 3. The total current is always lagging the voltage by 90 degrees.
- ☐ 4. The total current is always equal to the sum of the individual currents through R, L, and C.

Question ID : 630680485694
Option 1 ID : 6306801896992
Option 2 ID : 6306801896991
Option 3 ID : 6306801896993
Option 4 ID : 6306801896994
Status : Answered
Chosen Option : 1

Q.115 The primary purpose of an electrostatic precipitator in a power plant is to ____.

- Ans ☒ 1. Remove ash particles from the exhaust
- ☐ 2. Reduce fuel consumption
- ☐ 3. Generate electricity
- ☐ 4. Increase combustion efficiency

Question ID : 630680485741
Option 1 ID : 6306801897181
Option 2 ID : 6306801897180
Option 3 ID : 6306801897179
Option 4 ID : 6306801897182
Status : Answered
Chosen Option : 1

Q.116 What does Norton's theorem help determine the equivalent of?

- Ans ☒ 1. Current Source
- ☐ 2. Capacitance
- ☐ 3. Voltage Source
- ☐ 4. Resistance

Question ID : 630680485692
Option 1 ID : 6306801896984
Option 2 ID : 6306801896986
Option 3 ID : 6306801896983
Option 4 ID : 6306801896985
Status : Answered
Chosen Option : 1

Q.117 The VVVF method of speed control stands for:

- Ans ☐ 1. Voltage Variation and Frequency Fixation
- ☐ 2. Voltage Vector and Frequency Factor
- ☐ 3. Very Voltage Very Frequency
- ☒ 4. Variable Voltage Variable Frequency

Question ID : 630680485734
Option 1 ID : 6306801897153
Option 2 ID : 6306801897154
Option 3 ID : 6306801897152
Option 4 ID : 6306801897151
Status : Answered
Chosen Option : 4

Q.118 Which of the following statements best describes the Corona effect in Extra High Voltage (EHV) transmission lines?

- Ans ☒ 1. It is the phenomenon where a bluish glow appears along with a hissing noise around the conductors.
- ☐ 2. It is the phenomenon where the insulation of the transmission line gets permanently damaged due to high voltage.
- ☐ 3. It is the effect where the transmission line heats up excessively due to high current flow.
- ☐ 4. It is the effect where the transmission line starts to resonate at its natural frequency due to external disturbances.

Question ID : 630680485788
Option 1 ID : 6306801897368
Option 2 ID : 6306801897367
Option 3 ID : 6306801897370
Option 4 ID : 6306801897369
Status : Answered
Chosen Option : 1

Q.119 When a synchronous motor is on load with constant excitation, an increase in load will _____.

- Ans ☐ 1. Not affect the power factor
- ☒ 2. Decrease the power factor
- ☐ 3. Make the motor run asynchronously
- ☐ 4. Increase the power factor

Question ID : 630680485737
Option 1 ID : 6306801897165
Option 2 ID : 6306801897163
Option 3 ID : 6306801897166
Option 4 ID : 6306801897164
Status : Answered
Chosen Option : 2

Q.120 In a Boiling Water Reactor (BWR), the coolant used is _____.

- Ans ☐ 1. Heavy water
- ☒ 2. Light water
- ☐ 3. Liquid sodium
- ☐ 4. Carbon dioxide

Question ID : 630680485743
Option 1 ID : 6306801897187
Option 2 ID : 6306801897190
Option 3 ID : 6306801897188
Option 4 ID : 6306801897189
Status : Not Answered
Chosen Option : --

Section : General English

Q.1 Select the most appropriate preposition for the given blank.

If she doesn't rely _____ her driving skills as a source of her self-worth, it won't affect her self-esteem.

- Ans
- ☒ 1. in
 - ☒ 2. over
 - ☒ 3. on
 - ☒ 4. at

Question ID : 630680485811
Option 1 ID : 6306801897460
Option 2 ID : 6306801897462
Option 3 ID : 6306801897461
Option 4 ID : 6306801897459
Status : Answered
Chosen Option : 3

Q.2 Choose the word that means the same as the given word.

Abdicate

- Ans
- ☒ 1. Annulment
 - ☒ 2. Confiscate
 - ☒ 3. Rescindment
 - ☒ 4. Cede

Question ID : 630680485809
Option 1 ID : 6306801897453
Option 2 ID : 6306801897452
Option 3 ID : 6306801897454
Option 4 ID : 6306801897451
Status : Answered
Chosen Option : 2

Q.3 The question below consists of a set of labelled sentences. Out of the four options given, select the most logical order of the sentences to form a coherent paragraph.

P. This results in higher income, consumption and associated levels of emissions.
Q. The World Bank estimates that 80% of global GDP is produced in urban areas.
R. It is certain that a considerable share of the global carbon budget will be used up for building new infrastructure, particularly in fast-growing cities.
S. Further emissions take place when cities expand and land use changes – turning vegetation into city grounds.

- Ans
- ☒ 1. QSRP
 - ☒ 2. RSQP
 - ☒ 3. PQSR
 - ☒ 4. QPRS

Question ID : 630680485814
Option 1 ID : 6306801897474
Option 2 ID : 6306801897473
Option 3 ID : 6306801897471
Option 4 ID : 6306801897472
Status : Answered
Chosen Option : 2

Q.4 Choose the word that means the same as the given word.

Abbreviate

- Ans ☒ 1. Dilate
☒ 2. Sycophant
☒ 3. Curtail
☒ 4. Dilute

Question ID : 630680485808
Option 1 ID : 6306801897447
Option 2 ID : 6306801897448
Option 3 ID : 6306801897449
Option 4 ID : 6306801897450
Status : Not Answered
Chosen Option : --

Q.5 Select the most appropriate option for the given blank.

A king was made to kneel at the feet of _____ brahmin.

- Ans ☒ 1. the
☒ 2. No article
☒ 3. an
☒ 4. a

Question ID : 630680485813
Option 1 ID : 6306801897467
Option 2 ID : 6306801897470
Option 3 ID : 6306801897469
Option 4 ID : 6306801897468
Status : Answered
Chosen Option : 4

Q.6 Select the most appropriate option for the given blank.

Once _____ boy came running in from play and asked, Mother, what is milk?

- Ans ☒ 1. No article
☒ 2. an
☒ 3. the
☒ 4. a

Question ID : 630680485812
Option 1 ID : 6306801897466
Option 2 ID : 6306801897465
Option 3 ID : 6306801897463
Option 4 ID : 6306801897464
Status : Answered
Chosen Option : 4

Q.7 Select the most appropriate preposition for the given blank.

Being wrong opens us _____ the possibility of change.

- Ans ☒ 1. up to
 ☐ 2. into
 ☐ 3. with
 ☐ 4. of to

Question ID : 630680485810
Option 1 ID : 6306801897458
Option 2 ID : 6306801897456
Option 3 ID : 6306801897455
Option 4 ID : 6306801897457
Status : Answered
Chosen Option : 3

Comprehension:

Read the following passage and answer the questions given below.

Honey is a wonderful creation. It is deemed a top health food across the globe. Honey is among the most popular and widely used sweeteners, with enormous health benefits. It is used by several cultures around the world as a base for many traditional medicines, especially in Ayurveda. The health benefits and advantages of honey have been valued for ages.

Honey is known as an excellent source of natural energy as the natural, unprocessed sugar present in it enters the bloodstream directly, which in turn can give a quick boost of energy. According to a famous author and nutritionist, honey burns body fat even while you are sleeping. It is considered to be the best food for losing weight. Doctors recommend having a spoonful of honey before going to bed. You can also consume a little honey with warm water on an empty stomach early in the morning. Having it first thing in the morning helps increase the metabolism, which in turn helps reduce weight faster. Honey is also good for improving your overall health.

SubQuestion No : 8

Q.8 Which word means the same as the word 'enormous' used in the passage?

- Ans ☒ 1. Colossal
 ☐ 2. Frugal
 ☐ 3. Diabolical
 ☐ 4. Whimsical

Question ID : 630680485818
Option 1 ID : 6306801897484
Option 2 ID : 6306801897483
Option 3 ID : 6306801897485
Option 4 ID : 6306801897486
Status : Not Answered
Chosen Option : --

Comprehension:

Read the following passage and answer the questions given below.

Honey is a wonderful creation. It is deemed a top health food across the globe. Honey is among the most popular and widely used sweeteners, with enormous health benefits. It is used by several cultures around the world as a base for many traditional medicines, especially in Ayurveda. The health benefits and advantages of honey have been valued for ages.

Honey is known as an excellent source of natural energy as the natural, unprocessed sugar present in it enters the bloodstream directly, which in turn can give a quick boost of energy. According to a famous author and nutritionist, honey burns body fat even while you are sleeping. It is considered to be the best food for losing weight. Doctors recommend having a spoonful of honey before going to bed. You can also consume a little honey with warm water on an empty stomach early in the morning. Having it first thing in the morning helps increase the metabolism, which in turn helps reduce weight faster. Honey is also good for improving your overall health.

SubQuestion No : 9

Q.9 Choose the most suitable title for the given passage.

- Ans ☒ 1. Sweets and benefits
- ☒ 2. Natural or Synthetic
- ☒ 3. Ayurvedic Honey
- ☒ 4. Honey: A wonderful creation

Question ID : 630680485816
Option 1 ID : 6306801897477
Option 2 ID : 6306801897475
Option 3 ID : 6306801897476
Option 4 ID : 6306801897478
Status : Answered
Chosen Option : 4

Comprehension:

Read the following passage and answer the questions given below.

Honey is a wonderful creation. It is deemed a top health food across the globe. Honey is among the most popular and widely used sweeteners, with enormous health benefits. It is used by several cultures around the world as a base for many traditional medicines, especially in Ayurveda. The health benefits and advantages of honey have been valued for ages.

Honey is known as an excellent source of natural energy as the natural, unprocessed sugar present in it enters the bloodstream directly, which in turn can give a quick boost of energy. According to a famous author and nutritionist, honey burns body fat even while you are sleeping. It is considered to be the best food for losing weight. Doctors recommend having a spoonful of honey before going to bed. You can also consume a little honey with warm water on an empty stomach early in the morning. Having it first thing in the morning helps increase the metabolism, which in turn helps reduce weight faster. Honey is also good for improving your overall health.

SubQuestion No : 10

Q.10 According to the given passage, which of the following statements is NOT correct?

- Ans ☒ 1. Honey is used by several cultures around the world.
- ☒ 2. Honey can help in losing weight.
- ☒ 3. Honey can provide a quick boost of energy.
- ☒ 4. Honey's advantages are not valued by people.

Question ID : 630680485817
Option 1 ID : 6306801897480
Option 2 ID : 6306801897479
Option 3 ID : 6306801897482
Option 4 ID : 6306801897481
Status : Answered
Chosen Option : 4

Q.1 The table given below shows the number of working days of a company in 5 years.

Years	Working days
A	50
B	150
C	75
D	25
E	100

What is the average of number of working days in year D and E?

- Ans
- ☒ 1. 45.5
 - ☒ 2. 53.5
 - ☒ 3. 62.5
 - ☒ 4. 72.5

Question ID : 630680485827
Option 1 ID : 6306801897522
Option 2 ID : 6306801897520
Option 3 ID : 6306801897519
Option 4 ID : 6306801897521
Status : Answered
Chosen Option : 3

Q.2 A series is given with one term missing. Select the correct alternative from the given ones that will complete the series.
MNRM, OPUP, QRXS, STAV, ?

- Ans
- ☒ 1. UVDY
 - ☒ 2. UYDO
 - ☒ 3. UMNO
 - ☒ 4. VMNO

Question ID : 630680485822
Option 1 ID : 6306801897500
Option 2 ID : 6306801897501
Option 3 ID : 6306801897502
Option 4 ID : 6306801897499
Status : Answered
Chosen Option : 1

Q.3 In a class of 35 students, Zoya is placed 7th from the bottom whereas Sonia is placed 9th from the top. Shah is placed in between the two. What is Zoya's position from Shah?

- Ans
- ☒ 1. 11th
 - ☒ 2. 10th
 - ☒ 3. 13th
 - ☒ 4. 12th

Question ID : 630680485820
Option 1 ID : 6306801897491
Option 2 ID : 6306801897494
Option 3 ID : 6306801897492
Option 4 ID : 6306801897493
Status : Answered
Chosen Option : 2

Q.4 In a certain code language, 'DRIVING' is written as 'IPKXKTF'. What is the code for 'FACTORY' in that code language?

- Ans
- ✗ 1. ATQVEDI
 - ✗ 2. HCEVQTA
 - ✗ 3. ATQWECH
 - ✓ 4. ATQVECH

Question ID : 630680485823
Option 1 ID : 6306801897505
Option 2 ID : 6306801897506
Option 3 ID : 6306801897503
Option 4 ID : 6306801897504
Status : Answered
Chosen Option : 4

Q.5 Consider the string given below made up of letters. If 1st seven letters from left end are reversed. Then in the newly formed string which letter is 22nd from right end.

R I R Y R W W I W Y W W I I R Y I W
I R Y I I Y W

- Ans
- ✗ 1. R
 - ✓ 2. Y
 - ✗ 3. W
 - ✗ 4. I

Question ID : 630680485821
Option 1 ID : 6306801897495
Option 2 ID : 6306801897497
Option 3 ID : 6306801897498
Option 4 ID : 6306801897496
Status : Answered
Chosen Option : 2

Q.6 Eight teachers A, B, C, D, E, F, G and H are sitting around a circular table facing towards the centre (not necessarily in the same order). F is third to the right of C. H is third to the left of C. D is not the immediate neighbour of C or H. E is to the immediate right of A. G is second to the left of A. Who is third to the right of E?

- Ans
- ✗ 1. A
 - ✗ 2. G
 - ✓ 3. D
 - ✗ 4. C

Question ID : 630680485819
Option 1 ID : 6306801897489
Option 2 ID : 6306801897488
Option 3 ID : 6306801897487
Option 4 ID : 6306801897490
Status : Answered
Chosen Option : 3

Q.7 In the following question below are given some statements followed by some conclusions based on those statements. Taking the given statements to be true even if they seem to be at variance from commonly known facts. Read all the conclusions and then decide which of the given conclusion logically follows the given statements.

Statements:

I. All tailor are doctor.

II. No doctor is intelligent.

Conclusion:

I. All tailor are intelligent.

II. Some tailor are doctor.

- Ans** ☒ 1. Both conclusions I and II follows
☒ 2. Only conclusion II follows
☒ 3. Only conclusion I follows
☒ 4. Neither conclusion follows

Question ID : 630680485824

Option 1 ID : 6306801897509

Option 2 ID : 6306801897508

Option 3 ID : 6306801897507

Option 4 ID : 6306801897510

Status : Answered

Chosen Option : 2

Q.8 In the following question, select the missing number from the given series.

30, 61, 123, 247, 495, ?

- Ans** ☒ 1. 991
☒ 2. 997
☒ 3. 1017
☒ 4. 993

Question ID : 630680485828

Option 1 ID : 6306801897523

Option 2 ID : 6306801897525

Option 3 ID : 6306801897526

Option 4 ID : 6306801897524

Status : Answered

Chosen Option : 1

Q.9 In the following question, select the related letters from the given alternatives.

QRLJ : PPIF :: FCDY : ?

- Ans** ☒ 1. XPFF
☒ 2. NUVX
☒ 3. VBYW
☒ 4. EAAU

Question ID : 630680485825

Option 1 ID : 6306801897514

Option 2 ID : 6306801897511

Option 3 ID : 6306801897513

Option 4 ID : 6306801897512

Status : Answered

Chosen Option : 4

Q.10 Each of the following problems has a question and two statements (I) and (II).

What is the value of x ?

I. $x - 5 = 12$

II. $x^2 = 16$

Ans ☒ 1.

If the question can be answered by using both the statements together but not by either statement alone.

☒ 2.

If the question can be answered by using one of the statement alone but cannot be answered by using the other statement alone.

☒ 3.

If the question cannot be answered even by using both the statements together.

☒ 4.

If the question can be answered by using either of the statement (I) or (II) alone.

Question ID : 630680485826

Option 1 ID : 6306801897517

Option 2 ID : 6306801897515

Option 3 ID : 6306801897518

Option 4 ID : 6306801897516

Status : Not Answered

Chosen Option : --

Section : Quantitative Aptitude

Q.1 If $5P = 7Q$, then what is the value of $(P + Q)/P$?

Ans ☒ 1. $7/12$

☒ 2. $9/7$

☒ 3. $12/7$

☒ 4. $11/7$

Question ID : 630680485833

Option 1 ID : 6306801897543

Option 2 ID : 6306801897546

Option 3 ID : 6306801897545

Option 4 ID : 6306801897544

Status : Answered

Chosen Option : 3

Q.2 Two unbiased dices are rolled. What is the probability of getting a sum of 5?

Ans ☒ 1. $1/11$

☒ 2. $1/7$

☒ 3. $1/8$

☒ 4. $1/9$

Question ID : 630680485838

Option 1 ID : 6306801897566

Option 2 ID : 6306801897565

Option 3 ID : 6306801897564

Option 4 ID : 6306801897563

Status : Answered

Chosen Option : 4

Q.3 Two circles of radius of 42 cm each intersect each other such that each passes through the centre of the other. What is the length of the common chord?

- Ans**
- ☒ 1. 42 cm
 - ☒ 2. $42\sqrt{3}$ cm
 - ☒ 3. 27 cm
 - ☒ 4. $18\sqrt{3}$ cm

Question ID : 630680485842

Option 1 ID : 6306801897582

Option 2 ID : 6306801897580

Option 3 ID : 6306801897581

Option 4 ID : 6306801897579

Status : Not Answered

Chosen Option : --

Q.4 What is the value of $(x^2 - x + 1)(x + 1)$?

- Ans**
- ☒ 1. $x^3 + 1$
 - ☒ 2. $x^3 - 1$
 - ☒ 3. $x^3 - x$
 - ☒ 4. $x^3 - x^2$

Question ID : 630680485837

Option 1 ID : 6306801897561

Option 2 ID : 6306801897559

Option 3 ID : 6306801897560

Option 4 ID : 6306801897562

Status : Answered

Chosen Option : 1

Q.5 Length of a chord is 30 cm in a circle whose diameter is 34 cm. What will be the distance of this chord from the centre?

- Ans**
- ☒ 1. 15 cm
 - ☒ 2. 12 cm
 - ☒ 3. 8 cm
 - ☒ 4. 9 cm

Question ID : 630680485841

Option 1 ID : 6306801897578

Option 2 ID : 6306801897577

Option 3 ID : 6306801897575

Option 4 ID : 6306801897576

Status : Not Answered

Chosen Option : --

Q.6 It $\sin A = \frac{3}{4}$, then what is the value of $\cos A$?

Ans

☐ 1. $\frac{3}{\sqrt{7}}$

☒ 2. $\frac{\sqrt{7}}{4}$

☐ 3. $\frac{4}{3}$

☐ 4. $\frac{\sqrt{7}}{3}$

Question ID : 630680485843

Option 1 ID : 6306801897586

Option 2 ID : 6306801897584

Option 3 ID : 6306801897585

Option 4 ID : 6306801897583

Status : Answered

Chosen Option : 2

Q.7 What is the value of $(a + b)^2 + (a - b)^2$?

Ans

☐ 1. $8ab$

☐ 2. $4(a^2 + b^2)$

☐ 3. $4ab$

☒ 4. $2(a^2 + b^2)$

Question ID : 630680485836

Option 1 ID : 6306801897558

Option 2 ID : 6306801897556

Option 3 ID : 6306801897557

Option 4 ID : 6306801897555

Status : Answered

Chosen Option : 4

Q.8 If G is 30 percentage less than H and H is 50 percentage more than 1220, then what is the value of G?

Ans

☒ 1. 1281

☐ 2. 1381

☐ 3. 1181

☐ 4. 1081

Question ID : 630680485831

Option 1 ID : 6306801897535

Option 2 ID : 6306801897536

Option 3 ID : 6306801897537

Option 4 ID : 6306801897538

Status : Answered

Chosen Option : 1

Q.9 The length of the diagonal of a square is 12 cm. What is the area of the square?

- Ans**
- ✓ 1. 72 cm^2
 - ✗ 2. 48 cm^2
 - ✗ 3. 94 cm^2
 - ✗ 4. 60 cm^2

Question ID : 630680485839
Option 1 ID : 6306801897567
Option 2 ID : 6306801897569
Option 3 ID : 6306801897570
Option 4 ID : 6306801897568
Status : Answered
Chosen Option : 1

Q.10 What is the compound interest for 1 year on a sum of Rs. 10000 at the annual rate of 40 percentage compounding half yearly?

- Ans**
- ✗ 1. Rs. 4000
 - ✗ 2. Rs. 4800
 - ✓ 3. Rs. 4400
 - ✗ 4. Rs. 4700

Question ID : 630680485830
Option 1 ID : 6306801897532
Option 2 ID : 6306801897534
Option 3 ID : 6306801897533
Option 4 ID : 6306801897531
Status : Answered
Chosen Option : 3

Q.11 A bus travels $\frac{3}{4}$ part of its total journey at its usual speed. The remaining distance is covered by bus at $\frac{1}{4}$ speed of its usual speed. Due to slow speed it reaches its destination 120 minutes late. If the total distance is 200 km, then what is the usual speed of bus?

- Ans**
- ✗ 1. 90 km/hr
 - ✗ 2. 100 km/hr
 - ✗ 3. 60 km/hr
 - ✓ 4. 75 km/hr

Question ID : 630680485835
Option 1 ID : 6306801897551
Option 2 ID : 6306801897554
Option 3 ID : 6306801897553
Option 4 ID : 6306801897552
Status : Not Answered
Chosen Option : --

Q.12 N1, N2 and N3 can do a work in 50, 25 and 37.5 days respectively. All three of them began the work together but N2 left 7.5 days before the completion of the work. In how many days was the work completed?

- Ans**
- ☒ 1. 10 days
 - ☒ 2. 17 days
 - ☒ 3. 15 days
 - ☒ 4. 18 days

Question ID : 630680485834
Option 1 ID : 6306801897549
Option 2 ID : 6306801897550
Option 3 ID : 6306801897547
Option 4 ID : 6306801897548
Status : Not Answered
Chosen Option : --

Q.13 Among three girls, the weight of first girl is half of the weight of second girl and twice of the weight of third girl. If the average weight of these three girls is 84 kg, then what will be the total weight of second and third girl?

- Ans**
- ☒ 1. 170 kg
 - ☒ 2. 180 kg
 - ☒ 3. 198 kg
 - ☒ 4. 195 kg

Question ID : 630680485829
Option 1 ID : 6306801897529
Option 2 ID : 6306801897528
Option 3 ID : 6306801897530
Option 4 ID : 6306801897527
Status : Answered
Chosen Option : 2

Q.14 If the height of a given cone becomes $\frac{1}{3}$ and the radius of the base remains the same, then what is the ratio of the volume of the given cone and the new cone?

- Ans**
- ☒ 1. 4 : 1
 - ☒ 2. 3 : 1
 - ☒ 3. 3 : 2
 - ☒ 4. 4 : 2

Question ID : 630680485840
Option 1 ID : 6306801897574
Option 2 ID : 6306801897571
Option 3 ID : 6306801897573
Option 4 ID : 6306801897572
Status : Answered
Chosen Option : 2

Q.15 P sells a pen to Q at a profit of 30 percentage and Q sells it to R at a profit of 30 percentage. What is the ratio of cost prices of P and R?

- Ans** ☒ 1. 81 : 50
☒ 2. 100 : 133
☒ 3. 50 : 67
☒ 4. 100 : 169

Question ID : 630680485832
Option 1 ID : 6306801897541
Option 2 ID : 6306801897539
Option 3 ID : 6306801897542
Option 4 ID : 6306801897540
Status : Answered
Chosen Option : 4

Section : General Knowledge

Q.1 As per census 2011, the growth rate of population of India in the decade of 2001– 2011 was _____.

- Ans** ☒ 1. 13.7 percent
☒ 2. 17.7 percent
☒ 3. 19.7 percent
☒ 4. 11.7 percent

Question ID : 630680485853
Option 1 ID : 6306801897624
Option 2 ID : 6306801897625
Option 3 ID : 6306801897626
Option 4 ID : 6306801897623
Status : Not Answered
Chosen Option : --

Q.2 Which one of the following Rights is NOT included in 'Right to freedom'?

- Ans** ☒ 1. Form associations and unions
☒ 2. Move freely throughout the world
☒ 3. Freedom of speech and expression
☒ 4. Assembly in a peaceful manner

Question ID : 630680485854
Option 1 ID : 6306801897629
Option 2 ID : 6306801897630
Option 3 ID : 6306801897627
Option 4 ID : 6306801897628
Status : Answered
Chosen Option : 2

Q.3 Which of the following pairs of 'reform association – founder' is correctly matched?

- I. Arya Samaj – Swami Dayanand Saraswati
- II. Satyashodhak Samaj– Jyotirao Phule

- Ans ☒ 1. Both I and II
- ☒ 2. Neither I nor II
- ☒ 3. Only II
- ☒ 4. Only I

Question ID : 630680485850
Option 1 ID : 6306801897613
Option 2 ID : 6306801897614
Option 3 ID : 6306801897612
Option 4 ID : 6306801897611
Status : Answered
Chosen Option : 1

Q.4 Parliament of India consists of:

- I. The President
- II. The Rajya Sabha
- III. The Lok Sabha

- Ans ☒ 1. I, II and III
- ☒ 2. Only I and II
- ☒ 3. Only I and III
- ☒ 4. Only II and III

Question ID : 630680485856
Option 1 ID : 6306801897638
Option 2 ID : 6306801897635
Option 3 ID : 6306801897637
Option 4 ID : 6306801897636
Status : Answered
Chosen Option : 4

Q.5 Which company launched India's first Hydrogen Internal Combustion engine (H2ICE) technology?

- Ans ☒ 1. Reliance Industries
- ☒ 2. Tata Motors
- ☒ 3. Mahindra and Mahindra
- ☒ 4. Hero Moto Corp

Question ID : 630680485845
Option 1 ID : 6306801897591
Option 2 ID : 6306801897593
Option 3 ID : 6306801897592
Option 4 ID : 6306801897594
Status : Not Answered
Chosen Option : --

Q.6 What is the length of Indus river?

- Ans
- ☒ 1. 2500 km
 - ☒ 2. 2900 km
 - ☒ 3. 2000 km
 - ☒ 4. 3500 km

Question ID : 630680485852
Option 1 ID : 6306801897620
Option 2 ID : 6306801897621
Option 3 ID : 6306801897619
Option 4 ID : 6306801897622
Status : Not Answered
Chosen Option : --

Q.7 Who was the first headmistress of the country's first school for girls in Pune?

- Ans
- ☒ 1. Aruna Asaf Ali
 - ☒ 2. Anadibai Gopalrao Joshi
 - ☒ 3. Savitri Bai Phule
 - ☒ 4. Sucheta Kriplani

Question ID : 630680485848
Option 1 ID : 6306801897604
Option 2 ID : 6306801897603
Option 3 ID : 6306801897606
Option 4 ID : 6306801897605
Status : Not Answered
Chosen Option : --

Q.8 In September 2023, the Union Cabinet approved the e-Courts Project Phase III as a central sector scheme with financial outlay of Rs. _____.

- Ans
- ☒ 1. 8210 crore
 - ☒ 2. 6210 crore
 - ☒ 3. 5210 core
 - ☒ 4. 7210 crore

Question ID : 630680485847
Option 1 ID : 6306801897600
Option 2 ID : 6306801897599
Option 3 ID : 6306801897602
Option 4 ID : 6306801897601
Status : Not Answered
Chosen Option : --

Q.9 Which ministry launched AI chatbot for PM – KISAN scheme?

- Ans
- ☒ 1. Ministry of Social Justice and Empowerment
 - ☒ 2. Ministry of Rural Development
 - ☒ 3. Ministry of Electronics and Information Technology
 - ☒ 4. Ministry of Agriculture and Farmers Welfare

Question ID : 630680485846
Option 1 ID : 6306801897595
Option 2 ID : 6306801897598
Option 3 ID : 6306801897597
Option 4 ID : 6306801897596
Status : Answered
Chosen Option : 4

Q.10 In which of the following sports did Sarabjot singh win a gold medal for India at the Hangzhou Asian Games 2023?

- Ans
- ☒ 1. Boxing
 - ☒ 2. Table tennis
 - ☒ 3. Shooting
 - ☒ 4. Football

Question ID : 630680485844

Option 1 ID : 6306801897589

Option 2 ID : 6306801897587

Option 3 ID : 6306801897588

Option 4 ID : 6306801897590

Status : Not Answered

Chosen Option : --

Q.11 Who gave the watchwords “one caste, One Religion, One God for all men”?

- Ans
- ☒ 1. E.V. Ramaswamy Naickar
 - ☒ 2. Sri Narayan Guru
 - ☒ 3. Jyotirao Phule
 - ☒ 4. M.N. Srinivas

Question ID : 630680485849

Option 1 ID : 6306801897608

Option 2 ID : 6306801897610

Option 3 ID : 6306801897607

Option 4 ID : 6306801897609

Status : Not Answered

Chosen Option : --

Q.12 Which of the following is a characteristic of hot weather season in India?

- Ans
- ☒ 1. The temperature decreases from south to the north
 - ☒ 2. Days are warm and nights are cold.
 - ☒ 3. A striking feature of this season is the 'Loo'.
 - ☒ 4. During this season, the northeast trade winds prevail over the country.

Question ID : 630680485851

Option 1 ID : 6306801897615

Option 2 ID : 6306801897616

Option 3 ID : 6306801897618

Option 4 ID : 6306801897617

Status : Not Answered

Chosen Option : --

Q.13 Which one of the following pairs is correctly matched?

- I. Sugar – Simple Carbohydrate
- II. Rice – Complex Carbohydrate

Ans ☒ 1. Neither I nor II
☒ 2. Only II
☒ 3. Both I and II
☒ 4. Only I

Question ID : 630680485858
Option 1 ID : 6306801897646
Option 2 ID : 6306801897645
Option 3 ID : 6306801897644
Option 4 ID : 6306801897643
Status : Answered
Chosen Option : 3

Q.14 The members of the Rajya Sabha are elected by the _____.

Ans ☒ 1. elected and nominated members of the legislative assembly of various states.
☒ 2. nominated members of the legislative assembly of various states
☒ 3. elected members of the Lok Sabha
☒ 4. elected members of the legislative assembly of various states

Question ID : 630680485855
Option 1 ID : 6306801897634
Option 2 ID : 6306801897632
Option 3 ID : 6306801897633
Option 4 ID : 6306801897631
Status : Not Answered
Chosen Option : --

Q.15 Which one of the following are the main source of energy?

Ans ☒ 1. Vitamins
☒ 2. Proteins
☒ 3. Carbohydrates
☒ 4. Minerals

Question ID : 630680485857
Option 1 ID : 6306801897641
Option 2 ID : 6306801897640
Option 3 ID : 6306801897639
Option 4 ID : 6306801897642
Status : Answered
Chosen Option : 3