

IBPS RRB PO Mains Previous Year Paper 2024

Directions (1-3): Study the information carefully and answer the questions given below.

There are ten members in a family - A, B, C, D, E, F, G, H, I and J. H is the grandfather of F who is the sister of I. G is the son-in-law of E. D is the sister of H. J is the mother of F. E is the mother of A. C is father of B and the brother-in-law of H. E doesn't have any siblings. A is the sibling of J. E has only one daughter. A and I are not of same gender.

Q1. How is the brother-in-law of A related to H?

- (a) Brother
- (b) Son
- (c) Uncle
- (d) Father
- (e) Son-in-law

Q2. If K is the wife of B, then how many female members are there in the family?

- (a) Five
- (b) Seven
- (c) Six
- (d) Four
- (e) Can't be determined

Q3. Which of the following statements is true?

I. B is the child of H.

II. I is the son of J.

III. There are three married couples in the family.

- (a) Only I
- (b) Only III
- (c) Both I and III
- (d) Both II and III
- (e) Only II

Directions (4-8): Read the given information carefully and answer the questions based on it:

A certain number of persons are seated in a row facing north. Some of the persons like different colours. The total number of persons in the row is four times the number of persons sitting to the right of the one who likes white. The person who likes blue sits second to the left of N who sits 3rd to the right of the one who likes red. Two persons sit between O and M who sits sixth to the right of N. The person who likes brown sits exactly between P and Q who is adjacent to O. Four persons sit between R and S. O sits third from one end and is two places to the left of the one who likes purple. The one who likes orange sits second from the right end. Two persons sit between O and the one who likes brown. The one who likes green sits exactly between P and S. The one who likes white sits immediate right of M. The one who likes grey sits third to the left of T who sits third to the left of the one who likes purple. Neither N nor immediate neighbour of N likes green.

Q4. Who sits second to the left of the one who sits 3rd to the right of S?

- (a) The person who likes blue
- (b) The person who likes grey
- (c) O
- (d) The person who likes white
- (e) R

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Q5. How many persons are seated to the left of M?

- (a) 14
- (b) 15
- (c) 13
- (d) 10
- (e) 12

Q6. Which colour does the person who sits immediate left of R likes?

- (a) Green
- (b) Grey
- (c) Purple
- (d) Orange
- (e) Blue

Q7. Four of the following five are alike in a certain way and hence form a group. Which of the following does not belong to that group?

- (a) Q, M
- (b) R, P
- (c) S, The one who likes white
- (d) O, M
- (e) T, The one who likes grey

Q8. How many persons sit between O and the person who likes blue?

- (a) 11
- (b) 12
- (c) 10
- (d) 9
- (e) 14

Directions (9-11): In these questions, relationships between different elements are shown in the statements. The statements are followed by four conclusions. Study the conclusions based on the given statements and select the appropriate answer:

Q9. Statements:

$F > G = B \leq I \leq J < O = U, M \geq N \geq O = R \geq Q, Z > S = W \geq U > P$

Conclusions:

- I. $G \leq N$
- II. $S > Q$
- III. $Q \geq I$
- IV. $P < M$

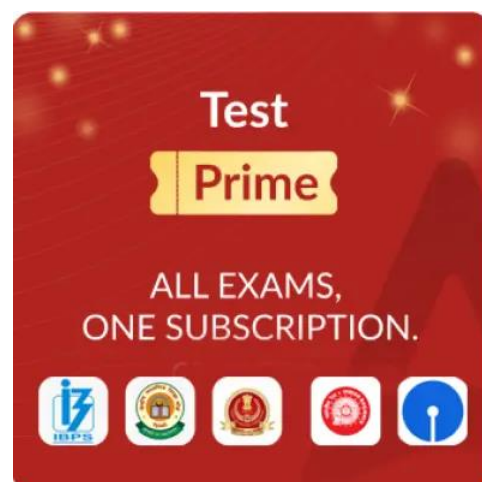
- (a) Only conclusions II and III are true
- (b) Only conclusion I is true
- (c) Both conclusions II and IV are true
- (d) Only conclusion IV is true
- (e) Both conclusions III and IV are true

Q10. Statements: $A \geq X = Q > S < B, H < I \leq W = K \leq S = R, M \geq I = C \leq E$

Conclusions:

- I. $X > C$
- II. $H < B$
- III. $A > M$
- IV. $R \geq E$

- (a) Only conclusion II is true
- (b) Either conclusion III or IV is true
- (c) Both conclusions II and IV are true
- (d) Only conclusion IV is true
- (e) Both conclusions I and II are true



Q11. Statements: $X < Y \geq Z = K > B$, $F = G \geq H < X = J$, $K < L \geq M = N$

Conclusions:

- I. $M > Y$
- II. $F > Z$
- III. $B < N$
- IV. $N \leq Y$
- (a) Only conclusions I and IV are true
- (b) Both conclusions II and III are true
- (c) None is true
- (d) Both conclusions III and IV are true
- (e) Either conclusion I or IV is true

Directions (12-14): In each of the following questions, a few statements have been given. Analyze the given statements and answer whether the data given in the statements are sufficient to answer the question.

Q12. In a certain coded language, what is the code for the word 'Library'?

Statement I: In a certain coded language, "New books are important" is coded as "md px rt uv" and "Library now open" is coded as "zn cx gt".

Statement II: In a certain coded language, "Library is city" is coded as "zn iq yb" and "New library is open" is coded as "yb px cx zn".

- (a) If statement I alone is sufficient
- (b) If both statements I and statement II together are sufficient
- (c) If statement I and statement II together are not sufficient
- (d) If either statement I or statement II is sufficient
- (e) If statement II alone is sufficient

Q13. Six persons –A, B, C, D, E and F live on a six-floor building, but not necessarily in the same order. The bottommost floor is numbered as 1, the floor immediately above it is numbered as 2, and so on till the topmost floor is numbered as 6. On which floor number does F live?

Statement I: C lives below B. There is gap of three floors between the floor on which D and F live. D lives above F who lives two floors below E. A lives above B and D.

Statement II: A lives below F and above B. B lives immediately above C. C lives below E.

- (a) If the data in statement I alone are sufficient to answer the question, while the data in statement II alone are not sufficient to answer the question.
- (b) If the data in statement II alone are sufficient to answer the question, while the data in statement I alone are not sufficient to answer the question.
- (c) If the data either in statement I alone or in statement II alone are sufficient to answer the question.
- (d) If the data given in both statements I and II together are not sufficient to answer the question.
- (e) If the data in both statements I and II together are necessary to answer the question.

Q14. What is the direction of Point T with respect to Point S?

Statement I: Arun starts walking from Point A and walks for 5km in the north direction to reach Point T, then turns right and walks for 6km to reach Point F. Then he turns left and walks for 6km to reach Point G. From Point G he turns right and walks for 2km to reach Point S.

Statement II: Arun starts walking from Point G and walks 7km in the east direction to reach Point T, then turns right and walks for 8 km to reach Point A. From Point A, he turns left and walks for 4km to reach Point E. Then, from Point E, he turns left and walks for 3 km to reach Point S.

- (a) If the data in statement I alone are sufficient to answer the question, while the data in statement II alone are not sufficient to answer the question.
- (b) If the data in statement II alone are sufficient to answer the question, while the data in statement I alone are not sufficient to answer the question.
- (c) If the data either in statement I alone or in statement II alone are sufficient to answer the question.
- (d) If the data given in both statements I and II together are not sufficient to answer the question.
- (e) If the data in both statements I and II together are necessary to answer the question.

Directions (15–19): Study the following information carefully and answer the given questions below:

Seven persons- A, B, C, D, E, F and G, were born in seven different years: 1961, 1964, 1968, 1975, 1982, 1986 and 1994. They are from seven different countries: Denmark, Switzerland, Poland, Latvia, Armenia, Bangladesh and Sweden. Their ages are calculated using the base year 2024. Each person is from a different country and no two persons are born in the same year. All the information is not necessarily in the same order.

The person who belongs to Latvia is 4 years elder than F. The sum of ages of E and F is double the age of the person who belongs to Poland. The age of the person who belongs to Armenia is twice of the age of D. B is immediately younger than the one who belongs to Sweden. D doesn't belong to Sweden. As many persons elder to G as younger to D. There is a gap of seven years between the one who belongs to Switzerland and A. C is elder than the person who belongs to Denmark. The one who belongs to Bangladesh is not the youngest person.

Q15. Who among the following persons is two persons younger than the one born in 1964?

- (a) The one who belongs to Latvia
- (b) The one who belongs to Switzerland
- (c) The one who belongs to Poland
- (d) The one who belongs to Armenia
- (e) None of these

Q16. What is the age difference between the one who belongs to Armenia and the one from Latvia?

- (a) 14 years
- (b) 18 years
- (c) 12 years
- (d) 16 years
- (e) None of these

Q17. How many persons were born between G and the one who belongs to Bangladesh?

- (a) One
- (b) Three
- (c) Two
- (d) None
- (e) Four

Q18. Which among the following statements is true?

- (a) C belongs to Poland.
- (b) G belongs to Latvia.
- (c) The person from Denmark was born in 1986.
- (d) C is 42 years old.
- (e) F belongs to Sweden.

Q19. Which among the following combinations is correct?

- (a) A – 42 years – Sweden
- (b) B – 49 years – Poland
- (c) D – 38 years – Denmark
- (d) G – 60 years – Latvia
- (e) All are incorrect

Q20. Statement: Should the government prioritize the construction of new highways over the maintenance of existing roads?

Arguments: I. Yes. New highways will boost economic activity and provide faster transportation routes.

II. No. Maintaining existing roads is cheaper and can prevent accidents due to poor road conditions.

III. Yes. New highways will create jobs and improve infrastructure development in remote areas.

Give answer:

- (a) if only argument I is strong
- (b) if only argument II is strong
- (c) if only argument III is strong
- (d) if only I and II are strong
- (e) if both I and III are strong

Q21. Statement: Should highway construction projects be delayed to conduct more environmental impact studies?

Arguments: I. Yes. These studies help ensure that construction does not cause long-term environmental harm.

II. No. Delaying projects will increase costs and hamper economic progress.

III. Yes. Delays will allow for more community consultations, ensuring more sustainable development.

Give answer:

- (a) if only argument I is strong
- (b) if only argument II is strong
- (c) if both I and III are strong
- (d) if both I and II are strong
- (e) if neither I nor II is strong

Q22. If in the given word "COURTEOUS" if we remove all the letters at odd position and then arrange all the letters in English Alphabetical order then find which letter is third from the right end in the new arrangement?

- (a) O
- (b) U
- (c) E
- (d) R
- (e) None of these

Directions (23-27): Study the following information carefully and answer the questions given below.

Eight boxes—P, Q, R, S, T, U, V and W—are stacked one above the other, but not necessarily in the same order. Each box contains a different item.

The box which contains strings is placed three boxes above Box T. The box which contains Jar is placed two boxes below Box T. Box V is placed immediately below the box which contains Strings. The number of boxes placed above Box V is one more than the number of boxes placed below the box which contains Glasses. Three boxes are placed between the boxes which contains Cups and Glasses. The box which contains Mirror is placed adjacent to the box which contains Cups. Three boxes are placed between the box which contains Mirror and Box P. Box R contains Rope. Box P is not the topmost box and doesn't contains Wires. Box S doesn't contain Mirror, Strings and Gloves. One box is placed between Box T and Box W. Box Q is placed below Box S.

Q23. Which among the following boxes contains Gloves?

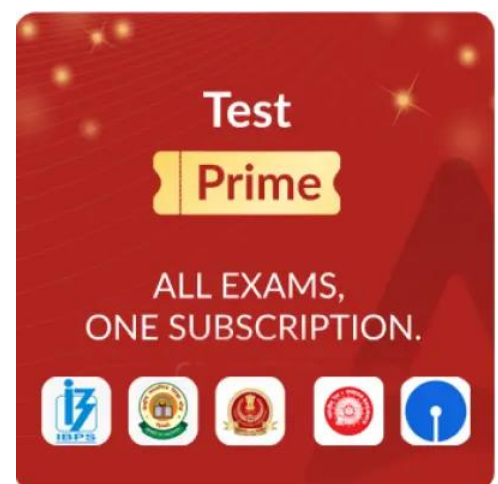
- (a) The box placed three boxes below Box W.
- (b) The box placed three boxes below Box T.
- (c) The box placed immediately below Box T
- (d) The box placed immediately below Box V.
- (e) None of these.

Q24. How many boxes are placed between Box P and the box which contains Mirror?

- (a) As many boxes placed between P and T.
- (b) Two
- (c) As many boxes placed between W and V.
- (d) Four
- (e) Six

Q25. The number of boxes placed above _____ is the same number of boxes placed below the box which contains _____.

- (a) Box Q, Glasses
- (b) Box T, Cups
- (c) Box U, Mirror
- (d) Box U, Rope
- (e) Box P, Gloves



Q26. If Box S and Box W interchanged their items, then which among the following items does Box W contain?

- (a) Mirror
- (b) Glasses
- (c) Cups
- (d) Rope
- (e) Jar

Q27. Which of the following statements is/are correct?

- I. Box S is placed immediately above Box P.
- II. Box T doesn't contain Cups
- III. Box P doesn't contain Gloves.

- (a) Only I
- (b) Only II
- (c) Only III
- (d) Both I and II
- (e) All I, II, and III

Q28. Statement: "The recent skirmishes along the India-China border have led to heightened tensions, but the government of India maintains that diplomatic talks will bring a long-term solution, and defence readiness is a precautionary measure to ensure national security in case of any escalation." – a statement by a government spokesperson.

Assumptions:

- I. India believes that diplomacy is more effective than military engagement in resolving the border dispute with China.
- II. The government fears that military escalation might still occur despite diplomatic efforts.

Which of the following assumption(s) is/are implicit in the statement?

- (a) Only I is implicit
- (b) Only II is implicit
- (c) Either I or II is implicit
- (d) Neither I nor II is implicit
- (e) Both I and II are implicit

Q29. Statement: "In response to increased Chinese military presence near the Line of Actual Control (LAC), India is ramping up infrastructure development along the border, with the expectation that stronger logistics will not only support defence operations but also benefit local populations economically." – view of a defence analyst.

Which of the following has been assumed in the above statement?

- (a) Infrastructure development will strengthen India's strategic position.
- (b) Local populations near the border will benefit from improved roads and facilities.
- (c) Chinese military activities are a direct threat to Indian sovereignty.
- (d) Economic development of border areas will reduce migration from those regions.
- (e) None of these

Directions (30-34): A number and word arrangement machine when given an input line of numbers following a particular rule in each step. The following is an illustration of an input & its rearrangement.

Input: 23 16 82 97 36 49 88 58 91 73

Step 1- 21 23 82 36 49 88 58 91 73 92

Step 2- 41 21 23 82 49 88 58 73 92 86

Step 3- 63 41 21 23 82 49 88 92 86 68

Step 4- 87 63 41 21 23 88 92 86 68 44

Step 5- 93 87 63 41 21 92 86 68 44 18

Step 5 is the last step of the above input as per the rules followed in the above steps. As per the above rule followed in the above steps, find out in each of the following questions the appropriate step for the given input.

Input: 60 53 46 12 91 82 77 66 21 37

Q30. What is the sum of third number from the right end and fourth number from the left end in Step 2?

- (a) 89
- (b) 78
- (c) 168
- (d) 90
- (e) None of the

Q31. How many numbers are divisible by 3 in Step 5?

- (a) Three
- (b) Four
- (c) Two
- (d) Five
- (e) One

Q32. What is the difference between the first number from right and left end in Step 3?

- (a) 27
- (b) 18
- (c) 17
- (d) 16
- (e) None of these

Q33. Which among the following number is seventh to the right of third number from the left end in step 4?

- (a) 21
- (b) 72
- (c) 86
- (d) 48
- (e) 32

Q34. Which among the following set of numbers is there in the final Step?

- (a) 88 71 65
- (b) 89 71 65
- (c) 72 48 32
- (d) 86 74 48
- (e) 72 48 31

Q35. If in the given word "MAGNANIMOUS" if we remove all the repeating letters and replace all the vowels with immediately succeeding letter and all the consonants with immediately preceding letter then find how many letters comes after P as per the alphabetical series in the new arrangement?

- (a) Three
- (b) Five
- (c) Two
- (d) One
- (e) Four

Q36. Statement: The government has introduced a new immigration system that is designed to streamline the process for skilled workers. This system aims to attract talent from across the globe by providing quicker visa approvals and simplifying the application process for workers in high-demand fields. The new system also includes provisions for dependent workers, allowing families to settle in the country more easily.

Conclusions: I. The new immigration system will help the country attract more skilled workers from abroad.

II. The new immigration system ensures that only workers in high-demand fields are eligible to apply for visas.

Which of the following can be concluded from the given statement?

- (a) Only I follows
- (b) Only II follows
- (c) Both I and II follow
- (d) Neither I nor II follows
- (e) None of these

Q37. Statement: The introduction of a points-based immigration system is aimed at regulating the inflow of immigrants by prioritizing skills, qualifications, and age. The government believes that this will not only address labour shortages but also ensure that immigrants contribute significantly to the country's economy.

Which of the following can be concluded from the above statement?

- (a) The new system will benefit immigrants with high qualifications.
- (b) Labor shortages will no longer be an issue after the system is implemented.
- (c) Both the skill level and age of the applicant will play a role in the immigration process.
- (d) The new system will be more beneficial for younger applicants than older ones.
- (e) None of these

Directions (38–40): Study the following information carefully and answer the given questions below:

Eight persons sit in two parallel rows – A, B, C and D sit in Row-1 and face north while P, Q, R and S sit in row 2 and face south, but not necessarily in same order. Each person has a different number of chocolates with them. The sum of total number of chocolates in row 1 is 139 and the sum of total number of chocolates in row 2 is 136.

The person who sits opposite to B sits second to the right of the person who has 22 chocolates. Only one person sits between the one who has 16 chocolates and B. S is immediate neighbour of the one who has 22 chocolates. S sits second to the left of R who sits opposite to the one who has 64 Chocolates. One of the immediate neighbours of R has 29 chocolates. The sum of number of chocolates Q and R have is 70. The one who sits immediately to the right of B has 34 chocolates. B doesn't sit opposite to Q. More than one person sits between D and A. D doesn't sit opposite to Q.

Q38. Four of the following five are alike in a certain way and form a group. Which of the following does not belong to the group?

- (a) Q
- (b) B
- (c) R
- (d) C
- (e) A

Q39. What is the sum of the number of chocolates S, B and C have?

- (a) 86
- (b) 91
- (c) 98
- (d) 81
- (e) 96

Q40. If R is related to B and in the same way S is related to A then who among the following is related to C?

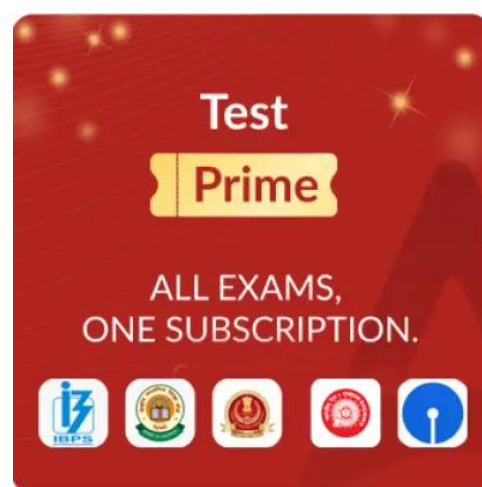
- (a) D
- (b) Q
- (c) P
- (d) The one who has 16 chocolates
- (e) The one who has 37 chocolates

Q41. Where is the document temporarily stored during working on a PC?

- (a) Hard Disk
- (b) CD-ROM
- (c) RAM
- (d) ROM
- (e) USB Drive

Q42. What is the primary purpose of Microsoft Access?

- (a) Word Processing
- (b) Spreadsheet Creation
- (c) Database Management
- (d) Graphic Design
- (e) Email Management



Q43. Which of the following is used in memory storage to maintain the state of a single bit of data?

- (a) Register
- (b) Cache
- (c) Flip-Flop
- (d) RAM
- (e) SSD

Q44. Convert the binary number $(101010)_2$ to its decimal equivalent.

- (a) 8
- (b) 32
- (c) 22
- (d) 42
- (e) 24

Q45. Which of the following computer generations used vacuum tubes?

- (a) Second Generation
- (b) Third Generation
- (c) Fourth Generation
- (d) First Generation
- (e) Fifth Generation

Q46. Which component temporarily stores data while the CPU performs ALU operations?

- (a) HDD
- (b) Accumulator
- (c) RAM
- (d) Control Unit
- (e) ROM

Q47. Which of the following is not hardware?

- (a) Hard Disk
- (b) Monitor
- (c) Printer
- (d) Python
- (e) Motherboard

Q48. In an email service, which feature is used to mark important emails for easy access?

- (a) Archive
- (b) Star Mark
- (c) Draft
- (d) Folder
- (e) Priority Label

Q49. Which of the following is not correct for non-volatile memory?

- (a) Data is retained even after the PC is turned off.
- (b) It is commonly used for long-term storage.
- (c) Data is lost after the PC is off.
- (d) Non-volatile memory includes devices like SSDs and Hard Drives.
- (e) It is slower than volatile memory like RAM.

Q50. What is the use of middleware?

- (a) Middleware is used for managing hardware resources.
- (b) Middleware enables the processing of multiple synchronous transactions between applications.
- (c) Middleware provides direct access to system memory for faster processing.
- (d) Middleware is used for storing data permanently.
- (e) Middleware is responsible for user interface design.

Q51. Which of the technology is used in the transaction of Bitcoin cryptocurrency?

- (a) Machine Learning
- (b) Artificial Intelligence
- (c) Data Mining
- (d) Blockchain
- (e) Cloud Computing

Q52. What type of malicious software appears to be legitimate but can actually cause harm to your computer or network?

- (a) Virus
- (b) Trojan
- (c) Worm
- (d) Spyware
- (e) Ransomware

Q53. Wireless USB is used in which of the following networks?

- (a) LAN (Local Area Network)
- (b) WAN (Wide Area Network)
- (c) PAN (Personal Area Network)
- (d) MAN (Metropolitan Area Network)
- (e) SAN (Storage Area Network)

Q54. Which of the following is not an antivirus software?

- (a) McAfee
- (b) Norton
- (c) CodeRed
- (d) Kaspersky
- (e) AVG

Q55. Which of the following performs the arithmetic and logical operations in a CPU?

- (a) ALU
- (b) Memory Unit
- (c) Control Unit
- (d) Cache
- (e) Register

Q56. Which of the following symbol is used to combine the contents of two or more cells in MS Excel?

- (a) %
- (b) +
- (c) &
- (d) =
- (e) *

Q57. Which type of malware is designed to collect information about a user without their knowledge?

- (a) Virus
- (b) Worm
- (c) Spyware
- (d) Ransomware
- (e) Trojan

Q58. Which of the following has the shortest access time of all memory units?

- (a) RAM
- (b) Cache
- (c) Hard Disk
- (d) SSD
- (e) CD-ROM

Q59. What is the full form of ATX?

- (a) Advanced Technology eXtended
- (b) Automatic Technology Expansion
- (c) Advanced Transfer Extension
- (d) Accelerated Technology X-factor
- (e) Auxiliary Technology Expansion

Q60. Ransomware is a type of:

- (a) Application Software
- (b) Encryption Malware
- (c) Decryption Malware
- (d) Antivirus Software
- (e) Protection Malware

Q61. What is the function of the Control Unit?

- (a) Interprets instructions
- (b) Prints data to a printer
- (c) Provides internet access
- (d) Adjusts screen resolution
- (e) Compresses files for storage

Q62. Which of the following are the most prominent and widely used IP protocols today?

- (a) IPv2 & IPv3
- (b) IPv5 & IPv7
- (c) IPv4 & IPv6
- (d) IPv1 & IPv7
- (e) IPv2 & IPv5

Q63. What is a Rootkit?

- (a) A type of software that hides malicious activities on a system
- (b) A security software used to protect sensitive data
- (c) A tool for enhancing system performance
- (d) A legitimate application used for system recovery
- (e) An antivirus used to detect malware

Q64. A stylus is a pen-like device that works using which technology?

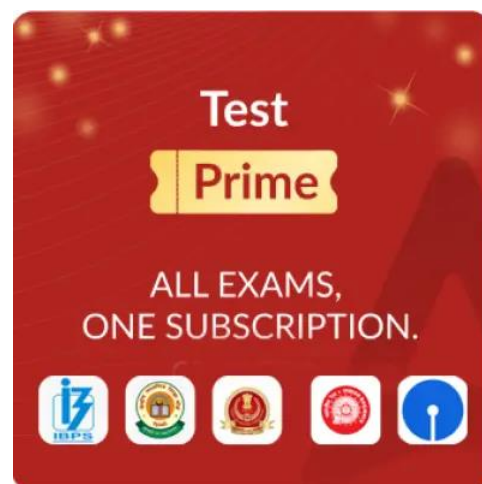
- (a) Laser
- (b) Pointer
- (c) UV Rays
- (d) Capacitive Touch
- (e) Magnetic Field

Q65. What is the use of an interrupt in a computer system?

- (a) To stop CPU tasks
- (b) To allocate memory
- (c) To handle urgent tasks and I/O
- (d) To save data
- (e) To protect against malware

Q66. Which equipment is used to increase the speed of a computer?

- (a) Increasing storage on the hard disk
- (b) Extending the size of RAM
- (c) Adding more USB ports
- (d) Installing antivirus software
- (e) Replacing the power supply



Q67. A handwritten signature can be converted into an image using which of the following devices?

- (a) Barcode Scanner
- (b) Graphic Tablet
- (c) Joystick
- (d) Optical Mouse
- (e) Trackball

Q68. Which of the following is the use of SMTP?

- (a) File Transfer
- (b) Web Browsing
- (c) Email Transmission
- (d) Data Encryption
- (e) Remote Access

Q69. Which of the following is a System Software?

- (a) Microsoft Word
- (b) Photoshop
- (c) UNIX
- (d) VLC Media Player
- (e) Chrome

Q70. Which of the following ports is commonly used to connect an internal hard disk drive (HDD) to a motherboard?

- (a) USB
- (b) HDMI
- (c) SATA
- (d) Ethernet
- (e) VGA

Q71. Which type of malware can spread across networks without attaching itself to a host file?

- (a) Virus
- (b) Worm
- (c) Trojan
- (d) Spyware
- (e) Adware

Q72. What is a phishing attack?

- (a) An attack that involves sending fraudulent emails to steal personal information
- (b) A technique used to block websites
- (c) A method to encrypt data during transmission
- (d) A type of malware that infects files
- (e) A process for scanning networks for vulnerabilities

Q73. How can parents monitor the type of content their children are accessing online?

- (a) Using Activity Logs
- (b) Using Antivirus Software
- (c) Disabling Internet Access
- (d) Installing External Storage
- (e) Using Word Processors

Q74. What is the difference between IMAP and POP3 in email protocols?

- (a) IMAP deletes emails after downloading, while POP3 keeps them on the server
- (b) IMAP allows syncing across multiple devices, while POP3 downloads emails to one device
- (c) IMAP is used for sending emails, while POP3 is used for receiving emails
- (d) IMAP encrypts emails, while POP3 does not
- (e) IMAP works offline, while POP3 requires an active internet connection

Q75. What does whitelisting mean in parental lock settings?

- (a) Blocking specific websites
- (b) Allowing only approved websites or content
- (c) Monitoring all online activities
- (d) Disabling internet access
- (e) Tracking time spent online

Q76. Which of the following is related to non-volatile memory?

- (a) RAM
- (b) Cache
- (c) SSD
- (d) Registers
- (e) CPU

Q77. Which of the following technology is used in optical disks to store data?

- (a) Magnetic Field
- (b) Laser
- (c) Electrical Charge
- (d) Capacitive Touch
- (e) UV Rays

Q78. What is a macro in MS Excel?

- (a) A built-in formula to perform calculations
- (b) A shortcut for creating charts
- (c) A feature to automate repetitive tasks
- (d) A formatting tool for adjusting cell size
- (e) A tool to sort data in ascending order

Q79. How do Virtual Reality (VR), Augmented Reality (AR), and Artificial Intelligence (AI) enhance human understanding of complex concepts?

- (a) By replacing human decision-making entirely
- (b) By creating immersive environments and intelligent systems that help visualize and process information
- (c) By automating all human tasks
- (d) By limiting access to information based on user preferences
- (e) By focusing only on physical task assistance

Q80. In Quantum Computing, which element is used in place of traditional bits to represent and process information?

- (a) Classical Bits
- (b) Qubits
- (c) Registers
- (d) Cache
- (e) Transistors

Q81. The International Finance Corporation (IFC) provided a \$500 million loan to HDFC Bank in May 2024. What is the primary purpose of this loan?

- (a) To fund large-scale industrial projects
- (b) To support infrastructure development in rural areas
- (c) To help self-help groups (SHGs) through microloans
- (d) To enhance digital banking services in urban regions
- (e) To finance housing projects for underserved communities

Q82. In TIME magazine's 2024 list of the world's most influential companies (Released in May 2024), Reliance Industries has been placed in the Titans category. Which other Indian company has been placed in the same category alongside Reliance?

- (a) Adani Group
- (b) Wipro
- (c) Infosys
- (d) Tata Group
- (e) Serum Institute of India

Q83. In May 2024, Airbus Helicopters signed a Memorandum of Understanding (MoU) with which bank to provide financing solutions for the purchase of its helicopters in India?

- (a) State Bank of India (SBI)
- (b) Small Industries Development Bank of India (SIDBI)
- (c) HDFC Bank
- (d) Punjab National Bank (PNB)
- (e) Bank of Baroda

Q84. The UDAM portal, developed by the Reserve Bank of India (RBI), serves what primary purpose?

- (a) Providing a platform to search for unclaimed deposits
- (b) Enabling users to track loan applications across banks
- (c) Facilitating online payments for government services
- (d) Offering financial literacy resources to individuals
- (e) Allowing banks to process faster credit approvals

Q85. In June 2024, which among the following became the first South American country to adopt a UPI-like instant payments system through a partnership with NPCI International Payments Limited (NIPL)?

- (a) Brazil
- (b) Argentina
- (c) Chile
- (d) Peru
- (e) Colombia

Q86. In 2024, NATO is celebrating how many years of collective defense as part of its anniversary?

- (a) 50 years
- (b) 60 years
- (c) 70 years
- (d) 75 years
- (e) 80 years

Q87. World Bee Day, which highlights the importance of bees and their contribution to sustainable development, is celebrated annually on which date?

- (a) April 22
- (b) May 5
- (c) May 20
- (d) June 15
- (e) July 10



Q88. According to banking guidelines, a savings or current account should be classified as inoperative or dormant if there are no transactions in the account for a period exceeding how many months?

- (a) 24 months
- (b) 18 months
- (c) 12 months
- (d) 30 months
- (e) 36 months

Q89. In April 2024, the Reserve Bank of India (RBI) issued guidelines for the voluntary conversion of which type of bank into universal banks, subject to certain conditions?

- (a) Payment Banks
- (b) Regional Rural Banks
- (c) Cooperative Banks
- (d) Foreign Banks
- (e) Small Finance Banks (SFBs)

Q90. In the QS World University Rankings 2025, which of the following institutes, other than IITs and IISc, were ranked among the top 11 from India?

- (a) University of Delhi
- (b) Anna University
- (c) Banaras Hindu University (BHU)
- (d) Both a & b
- (e) Both b & c

Q91. Which of the following countries was not elected as a non-permanent member of the United Nations Security Council (UNSC) for the two-year term starting January 1, 2025?

- (a) Denmark
- (b) Greece
- (c) Panama
- (d) Somalia
- (e) Uruguay

Q92. Consider the following statements regarding Alternative Investment Funds (AIFs) and Venture Capital Funds (VCFs):

1. AIFs are privately pooled investment vehicles that collect funds from sophisticated investors for investing in accordance with a defined investment policy.
2. Venture Capital Funds (VCFs) registered under the SEBI (Venture Capital Funds) Regulations, 1996 can continue to launch new schemes under the same regulations.
3. Existing VCFs can seek re-registration under SEBI (Alternative Investment Funds) Regulations, 2012, with the approval of two-thirds of investors by the value of their investment.

Which of the above statements is/are correct?

- (a) 1 and 2 only
- (b) 2 and 3 only
- (c) 1 and 3 only
- (d) 1 only
- (e) 1, 2, and 3

Q93. Under the Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA), how many days of guaranteed wage employment are provided to rural households in a financial year?

- (a) 50 days
- (b) 75 days
- (c) 100 days
- (d) 125 days
- (e) 150 days

Q94. As per the Election Commission's recent announcement, voters above which age can vote from home using the Saksham App, which facilitates easier voting for Persons with Disabilities?

- (a) 70 years
- (b) 75 years
- (c) 80 years
- (d) 85 years
- (e) 90 years

Q95. Under the Namo Drone Didi Scheme, what is the maximum subsidy amount provided by the Government of India for purchasing drones?

- (a) INR 5 lakh
- (b) INR 6 lakh
- (c) INR 7 lakh
- (d) INR 8 lakh
- (e) INR 10 lakh

Q96. Entrepreneur and pilot Gopi Thotakura is set to become the first Indian to venture into space as a tourist on the NS-25 mission of Blue Origin. Blue Origin is a private aerospace company focused on developing reusable rocket technology and expanding access to space. Who is the founder of Blue Origin?

- (a) Richard Branson
- (b) Elon Musk
- (c) Jeff Bezos
- (d) Larry Page
- (e) Bill Gates

Q97. What is the name of the naval version of Israel's Iron Dome air defense system, which was deployed for the first time against a suspicious target near the city of Eilat?

- (a) Sea Dome
- (b) Aqua Shield
- (c) C-Dome
- (d) Ocean Defender
- (e) Naval Iron Dome

Q98. Nobel prize-winning physicist Peter Higgs, who passed away at the age of 94, proposed the existence of which particle in 1964 that helps explain how other particles acquire mass?

- (a) Neutron
- (b) Electron
- (c) Photon
- (d) God particle
- (e) Quark

Q99. As per the Reserve Bank of India's (RBI) revised guidelines announced on June 7, 2024, what is the new limit for bulk deposits for scheduled commercial banks and small finance banks (SFBs)?

- (a) Rs 3 crore and above
- (b) Rs 2 crore and above
- (c) Rs 1 crore and above
- (d) Rs 4 crore and above
- (e) Rs 5 crore and above

Q100. In the context of a surety bond, which entity provides the bond on behalf of the contractor or business owner to guarantee future work performance to the obligee?

- (a) Bank
- (b) Insurance company
- (c) Contractor
- (d) Government
- (e) Obligee

Q101. Which mission aims to create a competent civil service in India, rooted in Indian ethos, with a focus on empowering public servants for effective and efficient public service delivery?

- (a) Mission Shakti
- (b) Mission Vikas
- (c) Mission Pragati
- (d) Mission Bharat
- (e) Mission Karmayogi

Q102. Which flagship conference on geopolitics and geo-economics was inaugurated by Prime Minister Shri Narendra Modi on February 21, 2024, with the Prime Minister of Greece, H.E. Mr. Kyriakos Mitsotakis, as the Chief Guest?

- (a) Shangri-La Dialogue
- (b) Raisina Dialogue
- (c) Asia Economic Forum
- (d) Davos Summit
- (e) Global Leadership Summit

Q103. Which country will host the G20 summit in 2025, as part of the annual rotating presidency among its members?

- (a) Brazil
- (b) United States
- (c) South Africa
- (d) India
- (e) Australia

Q104. The Swamitva Scheme aims to benefit the significant tribal population by providing them with which of the following?

- (a) Record of Rights
- (b) Education grants
- (c) Free healthcare services
- (d) Agricultural subsidies
- (e) Employment opportunities

Q105. Which of the following companies are owned by Meta Platforms, Inc., formerly known as Facebook?

- (a) Twitter, WhatsApp, Facebook, Threads
- (b) Instagram, Facebook, WhatsApp, Threads
- (c) LinkedIn, Instagram, WhatsApp, Facebook
- (d) Snapchat, Facebook, Instagram, WhatsApp
- (e) YouTube, Instagram, WhatsApp, Facebook

Q106. Who is the President of the Council of Scientific & Industrial Research (CSIR), known for its cutting-edge R&D in various scientific and technological fields?

- (a) Prime Minister of India
- (b) Minister of Science and Technology
- (c) President of India
- (d) Chief Scientific Adviser
- (e) Director General of CSIR

Q107. Which city in India is known as the "Perfume Capital of India" due to its traditional expertise in producing fragrances?

- (a) Mysuru
- (b) Kannauj
- (c) Jaipur
- (d) Varanasi
- (e) Lucknow

Q108. In the TReDS platform, which type of entities can participate as sellers for facilitating the financing or discounting of trade receivables?

- (a) Large Corporates
- (b) Government Departments
- (c) Public Sector Undertakings (PSUs)
- (d) Micro, Small, and Medium Enterprises (MSMEs)
- (e) Banks and Financial Institutions

Q109. As of March 31, 2024, which of the following private sector banks has been assigned Lead Bank responsibility under the Lead Bank Scheme?

- (a) HDFC Bank and Axis Bank
- (b) Kotak Mahindra Bank and Yes Bank
- (c) Jammu & Kashmir Bank and ICICI Bank
- (d) Axis Bank and ICICI Bank
- (e) HDFC Bank and IndusInd Bank

Q110. Which port in India became the largest major port in terms of cargo volumes, handling 145.38 million tonnes in FY24, surpassing Deendayal Port Authority for the first time in its history?

- (a) Jawaharlal Nehru Port
- (b) Kandla Port
- (c) Chennai Port
- (d) Paradip Port
- (e) Visakhapatnam Port

Q111. According to the Economic Survey 2023-24, how many jobs does the Indian economy need to generate annually in the non-farm sector until 2030 to cater to the rising workforce?

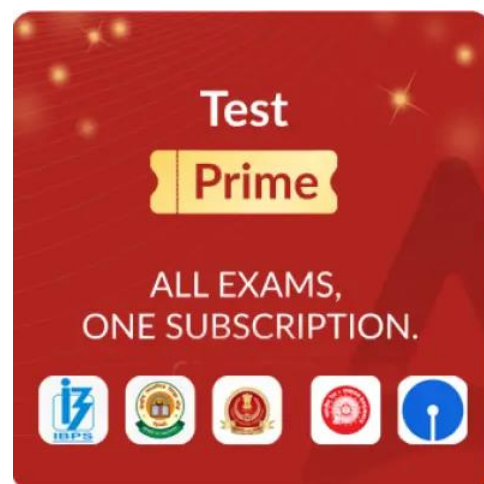
- (a) 50.2 lakh
- (b) 65.3 lakh
- (c) 78.5 lakh
- (d) 85.7 lakh
- (e) 90.8 lakh

Q112. What is the name of the virtual assistant developed by Apple, used across its devices like iPhones, iPads, and Macs?

- (a) Alexa
- (b) Cortana
- (c) Google Assistant
- (d) Siri
- (e) Bixby

Q113. Which of the following abbreviations is related to banking but is not related to loans?

- (a) CVV
- (b) LTV
- (c) EMI
- (d) KCC
- (e) NPA



Q114. The International Union for Nature Conservation (IUCN) has listed mangroves in coastal regions of Sri Lanka and Maldives as 'critically endangered'. Which Indian state's coastal mangroves have also been included in this global assessment?

- (a) Kerala
- (b) Gujarat
- (c) Odisha
- (d) Tamil Nadu
- (e) West Bengal

Q115. The National Commission on Farmers, which submitted its report in 2006 and recommended that the Minimum Support Price (MSP) should be at least 50% more than the weighted average cost of production, was headed by whom?

- (a) Dr. Raghuram Rajan
- (b) Dr. M. S. Swaminathan
- (c) Dr. Amartya Sen
- (d) Dr. Manmohan Singh
- (e) Dr. C. Rangarajan

Q116. Consider the following statements regarding Geographical Indication (GI) tags in India:

1. The first GI tag in India was awarded to Darjeeling tea in 2004-05.
2. The Geographical Indications of Goods (Registration and Protection) Act, 1999 came into effect in 2003.
3. A geographical indication (GI) tag is valid for 7 years and can be renewed for another 7 years.

Which of the above statements is/are not true?

- (a) 3 only
- (b) 1 and 2 only
- (c) 2 and 3 only
- (d) 1 and 3 only
- (e) 1, 2, and 3

Q117. Which of the following is not a type of Priority Sector Lending Certificate (PSLC)?

- (a) PSLC Agriculture
- (b) PSLC SF/MF
- (c) PSLC Micro Enterprises
- (d) PSLC Education
- (e) PSLC General

Q118. Consider the following statements regarding the Agriculture Infrastructure Fund:

1. All loans under the scheme up to ₹2 crore will have an interest subvention of 3% per annum for a maximum period of 7 years.
2. The scheme covers post-harvest management projects such as e-marketing platforms, warehouses, cold chains, and logistics facilities.
3. The scheme is operational from 2020-21 to 2035-36, with loan disbursement to be completed by the end of Financial Year 2028-29.

Which of the above statements is/are incorrect?

- (a) 1 only
- (b) 2 only
- (c) 3 only
- (d) 1 and 2 only
- (e) 1, 2, and 3

Q119. The SWAMIH Investment Fund I, managed by SBICAP Ventures Ltd., is primarily related to which of the following?

- (a) Affordable and Mid-Income Housing
- (b) Infrastructure Projects
- (c) Industrial Development
- (d) Renewable Energy Projects
- (e) Small and Medium Enterprises (SMEs)

Q120. Under the RB-IOs 2021, what is the maximum compensation amount that the RBI Ombudsman can provide for mental agony or harassment suffered by the complainant?

- (a) ₹50,000
- (b) ₹75,000
- (c) ₹1 lakh
- (d) ₹1.5 lakh
- (e) ₹2 lakh

Directions (121-124): Each of the following questions consists of a paragraph, which may contain one or more grammatical errors. Read the given paragraphs carefully, and then decide how many errors each paragraph contains.

Q121. Russia's geopolitical pivot too Asia, particularly in light of global shifts, marks a strategic realignment with key regional players, especially India. Strengthen ties with India offers Russia opportunities for economic collaboration, technology transfer, and energy partnerships. This pivot comes as Russia seeks to diversify it's international relations amid growing tensions with the West. India, on the other hand, views this partnership as a means to enhance its regional influence and secure vital resources. The evolving dynamics among the two nations underscore the importance of their role in shaping Asia's geopolitical landscape.

- (a) Only one error
- (b) Two errors
- (c) Three errors
- (d) Four errors
- (e) No errors

Q122. India's evolving security challenges, both internal as well as external, necessitate a comprehensive 'National Security Strategy.' As regional dynamics shift and new threats such as cyber warfare, terrorism, and border tensions emerge, a cohesive strategy would helps streamline the country's defense, intelligence, and diplomatic efforts. This framework would guide decision-making, ensuring that national interests are protected across military, economic, and technological domains. Additionally, it would enable India to proactively address security risks, enhance preparedness, and strengthen collaborations with global allies, ultimately safeguarding its sovereignty and promoting regional stability.

- (a) Only one error
- (b) Two errors
- (c) Three errors
- (d) Five errors
- (e) No error

Q123. NITI Aayog recent unveiled the "Greening and Restoration of Wasteland with Agroforestry" (GROW) report, highlighting the potential of agroforestry to rejuvenate India's vast wastelands. The report emphasizes the role of agroforestry in enhancing biodiversity, improve soil health, and supporting sustainable livelihoods for rural communities. It propose a multi-sectoral approach, involving government agencies, private sector, and local communities, to transform barren lands into productive ecosystems. The GROW initiative is part of India's broader strategy to combat climate change, increase carbon sequestration, and meet its land restoration commitments under international environmental agreements.

- (a) Only one error
- (b) Two errors
- (c) Three errors
- (d) Five errors
- (e) No error

Q124. Learning languages offers numerous cognitive, cultural, and social benefits, making it a vital skill in today's interconnected world. It enhances problem-solving abilities, improves memory, and boosts multitasking skills by engaging different parts of the brain. Beyond cognitive development, mastering a new language fosters cross-cultural understanding, promoting global cooperation and empathy. In professional settings, language proficiency opens doors to new markets, enhances communication, and provides a competitive edge. Ultimate, learning languages broadens perspectives, empowering individuals to connect with diverse communities and navigate the global landscape more effectively.

- (a) Only one error
- (b) Two errors
- (c) Three errors
- (d) Five errors
- (e) No error

Directions (125-128): Each of the following questions contain a sentence which has been divided into five parts which might not be in their correct order of narrative. The sentence is then followed by five options, one of which gives the sequence of the rearranged parts to make the sentence meaningful. Choose the option which gives the correct sequence of the parts. If the sentence is already arranged in the correct sequence or the correct sequence doesn't match with any of the given sequence, mark option " No rearrangement required " as your answer.

Q125.

- (A)approval journey for customers
- (B)onboarding processes, simplifying
- (C)the loan application and
- (D)ramping up their digital
- (E)financial institutions are
- (a) EDCBA
- (b) EDBCA
- (c) DBCEA
- (d) DCBEA
- (e) No rearrangement required

Q126.

- (A)International Self-Care Day is
- (B)July each year to emphasize
- (C)celebrated on the 24th of
- (D)self-care and self-love
- (E)the importance of
- (a) ADBEC
- (b) ACDEB
- (c) ABCED
- (d) ACBED
- (e) No rearrangement required

Q127.

- (A) support and guidance as needed
- (B) role of caregivers for their
- (C)"parenting parents" refers to
- (D) adult children taking on the
- (E) aging parents, providing
- (a) CDBEA
- (b) DEACB
- (c) CADEB
- (d) DBEAC
- (e) No rearrangement required



Q128.

- (A) handwriting, particularly in prescriptions and
(B) medical notes, which can sometimes lead to
(C) misunderstandings or errors in patient care
(D) "Doctors and handwriting" often refers to
(E) the stereotype that doctors have illegible
(a) BCEAD
(b) ACDEB
(c) DEABC
(d) ECADB
(e) No rearrangement required

Directions (129): In the following question, two sentences are provided. Select the most appropriate connector to combine them into a coherent and grammatically correct sentence, ensuring the context of the original sentences remains unchanged.

Q129.

- (A) the manager reviewed the proposal
(B) she approved it after discussing some minor modifications.
(i) and
(ii) in addition to
(iii) likewise
(a) only (i)
(b) both (i) and (ii)
(c) only (ii)
(d) both (ii) and (iii)
(e) only (iii)

Directions (130-135): In the following passage there are blanks, each of which has been denoted by letters. For each blank, five options are given. Choose the most appropriate word from the options that fits the blank appropriately.

The discovery of cells marked a monumental _____ (A) _____ point in biological science. In 1665, Robert Hooke first identified cells while observing cork tissue _____ (B) _____ a microscope, describing the small compartments as "cells" due to their resemblance to monk cells. This revelation led to the development of cell theory, which _____ (C) _____ that all living organisms are composed of cells, the basic unit of life. Scientific research _____ (D) _____ rapidly, with the discovery of various cell structures and functions, including the nucleus, mitochondria, and DNA. Among the most significant developments in cell biology is the study of HeLa cells, a line of human cells _____ (E) _____ from Henrietta Lacks in 1951. These cells are legendary in research due to their unique ability to continuously divide, making them "immortal." HeLa cells have been vital for countless scientific breakthroughs, from developing the polio vaccine to advancing cancer research, _____ (F) _____ the essential role of cellular biology in modern medicine.

Q130. Which of the following words will fit in the given blank (A)?

- (a) showing
(b) looping
(c) dialing
(d) blowing
(e) turning

Q131. Which of the following words will fit in the given blank (B)?

- (a) over
(b) above
(c) under
(d) below
(e) around

Q132. Which of the following words will fit in the given blank (C)?

- (a) postulates
- (b) activities
- (c) affiliates
- (d) calculates
- (e) regulates

Q133. Which of the following words will fit in the given blank (D)?

- (a) plugged
- (b) furnished
- (c) advanced
- (d) fettered
- (e) repaired

Q134. Which of the following words will fit in the given blank (E)?

- (a) taken
- (b) thought
- (c) took
- (d) sunk
- (e) reflected

Q135. Which of the following words will fit in the given blank (F)?

- (a) manifesting
- (b) highlighting
- (c) associating
- (d) fabricating
- (e) directing

Directions (136-139): Read the following passage and answer the questions based on that.

Jahnvi: "Alright, team. Now that we've had a productive lunch, let's dive into the project updates. We're heading into the final stretch, and it's time to **cross the T's and dot the I's**. Alia, how's the development phase coming along?"

Alia: "It's going well, Jahnvi. We've finished about 85% of the core coding, but we **hit a small snag** in the API integration. I think we can smooth things over, but it might take an extra day or two."

Jahnvi: "Good to know. Remember, **the devil is in the details**. Make sure the integration is flawless, or we'll have bigger issues down the line. Karan, what about the client presentation? Are we on track?"

Karan: "Yes, I've got the main slides ready, but I need to fine-tune the financial breakdowns. I also want to double-check with the marketing team before finalizing it."

Jahnvi: "That's a good approach. Don't put all your eggs in one basket. Collaborating with the marketing team will help ensure we've got everything aligned before the client sees it."

Alia: "I agree, better safe than sorry. But Karan, let me know if you need any tech input for the slides. We don't want to miss any technical aspects."

Karan: "Thanks, Alia. I'll **loop you in** once I finalize the data."

Jahnvi: "Great teamwork, both of you. Let's keep our eyes on the prize. We're almost there, and a little extra attention now will save us from headaches later. Just remember, this project needs to be airtight by the time we present it to the client."

Alia: "We've got this, Jahnvi. I'll ensure the coding is completed and thoroughly tested."

Karan: "And I'll make sure the presentation is polished and ready to go."

Jahnvi: "Perfect. Let's make sure everything is on point and leave no stone unturned."

Q136. What does Alia want to convey by using the idiom "hit a small snag" in the context of the passage?

- (a) They have encountered a minor issue in the API integration that may cause some delay.
- (b) The project is running smoothly, but additional features need to be added to the API.
- (c) The team needs to abandon the current approach and start over with the API integration.
- (d) The API integration has been completed successfully, and no further adjustments are required.
- (e) The project has encountered a major roadblock that will halt development for several days.

Q137. What does Karan want to convey to Alia by using the idiom “loop you in” in the context of the passage?

- (a) He is asking Alia to join him in the final client meeting for additional support.
- (b) He will keep Alia informed about the coding updates as soon as she finishes testing.
- (c) He wants Alia to handle the final review of the presentation slides independently.
- (d) He intends to provide Alia with regular updates about all aspects of the project.
- (e) He plans to involve Alia in the process once the data is finalized for the presentation.

Q138. What does the phrase “the devil is in the details” imply in the context of the passage?

- (a) It indicates that unnecessary attention to minor tasks could lead to delays in project completion.
- (b) It suggests that focusing on trivial details will distract the team from the bigger project goals.
- (c) It conveys that the most important parts of the project have already been completed successfully.
- (d) It emphasizes the need to address small, overlooked issues in the project that may cause major problems later.
- (e) It implies that technical details should be handled by experts only, as they are too complex for the team to understand.

Q139. What does the idiom “cross the T’s and dot the I’s” imply in the context of the passage?

- (a) To focus primarily on completing the coding phase of the project and ensuring it’s functional.
- (b) To finalize all necessary client communications before moving forward with the project.
- (c) To pay meticulous attention to details and ensure that everything is executed flawlessly.
- (d) To rely on the marketing team's input to finalize the client presentation and financial data.
- (e) To make rapid progress in the development phase and ensure tasks are completed ahead of time.

Directions (140-143): In the given sentence, four words are highlighted which may or may not be grammatically and contextually correct. Choose the option from the given options that can be the best replacement for the highlighted words.

Q140. The PMLA, 2002, **goals** to prevent money **picking** and provides for the **annex** of property obtained through or involved in money laundering, **among** with addressing related issues.

- (a) plans, cleaning, acquisition, amidst
- (b) attempts, purging, seizure, besides
- (c) intends, bleeping, looting, amongst
- (d) aims, laundering, confiscation, along
- (e) No replacement required

Q141. General Consent **authority** the CBI **in** conduct investigations in a state without **searching** permission **with** each case.

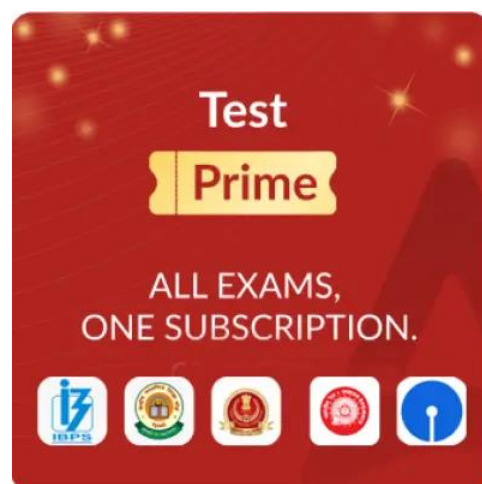
- (a) enables, on, executing, from
- (b) allows, to, seeking, for
- (c) empowers, at, demanding, by
- (d) approves, for, requiring, on
- (e) No replacement required

Q142. The **signature** of the BIT **among** India and Uzbekistan nations will **upgrades** economic cooperation and **deep** the investment environment.

- (a) signing, between, enhance, strengthen
- (b) registering, amongst, enrich, toughen
- (c) subscribing, amidst, better, fortify
- (d) inking, through, improve, intensity
- (e) No replacement required

Q143. The amendment takes **affect** for all UN members when **affirm** by two-thirds of the General Assembly and ratified by two-thirds of UN members, **exclusive** all permanent Security Council **member**.

- (a) affect, confirmed, excluding, member
- (b) effects, confirm, except, countries
- (c) effect, approved, including, members
- (d) affect, verified, excluding, nations
- (e) No replacement required



Directions (144-146): Select the phrase/connector (STARTERS) from the given three options which can be used to form a single sentence from the two sentences given below, implying the same meaning as expressed in the statement sentences.

Q144.

(I) The Reserve Bank of India (RBI) plays a crucial role in maintaining financial stability in the country.

(II) Ensuring strict regulation of the banking sector is essential for the RBI.

(i) Since the RBI plays a crucial role...

(ii) However, the RBI plays a crucial role...

(iii) Given that the RBI plays a crucial role...

(a) Only (ii)

(b) Only (i)

(c) Both (i) and (iii)

(d) Both (ii) and (iii)

(e) All of these

Q145.

(I) The Kisan Vikas Patra (KVP) is a savings scheme that aims to encourage long-term investment among farmers.

(II) The scheme guarantees a fixed return after the maturity period.

(i) As the Kisan Vikas Patra is a savings scheme...

(ii) Despite being a savings scheme, the Kisan Vikas Patra...

(iii) Considering the Kisan Vikas Patra is a savings scheme...

(a) Only (ii)

(b) Only (iii)

(c) Both (i) and (iii)

(d) Both (ii) and (iii)

(e) All of these

Q146.

(I) Digital farming is transforming agricultural practices by integrating technology into farming operations.

(II) It enhances productivity by using data-driven insights and automation.

(i) Since digital farming is transforming agricultural practices...

(ii) Although digital farming transforms agricultural practices...

(iii) Given that digital farming is transforming agricultural practices...

(a) Both (ii) and (iii)

(b) Only (i)

(c) None of these

(d) Only (ii)

(e) Both (i) and (iii)

Directions (147-151): Read the following passage, and answer the given questions.

In the modern era, nations worldwide are striving for rapid economic growth, measured largely by Gross Domestic Product (GDP). A higher GDP is often equated with improved living standards, greater employment opportunities, and technological advancement. However, the race for GDP growth frequently comes at the cost of environmental sustainability, contributing to rising global temperatures and climate instability.

Economic growth, especially in developing nations, often relies on industrialization, deforestation, and the exploitation of natural resources. These activities, while boosting GDP, release vast amounts of greenhouse gases into the atmosphere, accelerating global warming. As temperatures rise, the adverse effects on the environment become more pronounced—melting ice caps, rising sea levels, and increasingly severe weather events. This, in turn, threatens long-term economic stability, as natural disasters can disrupt industries, displace communities, and strain resources.

The challenge for governments is finding a balance between GDP growth and environmental protection. Sustainable development models are gaining traction, emphasizing green technologies, renewable energy sources, and eco-friendly practices that reduce carbon footprints. Investing in renewable energy, such as wind and solar power, can drive economic growth while mitigating the harmful effects of fossil fuel consumption. These industries not only _____ to GDP but also help combat the global climate crisis.

Moreover, many economists argue that GDP, as a metric, should evolve to account for environmental degradation and social well-being. Some propose integrating "green GDP," which factors in the economic costs of environmental harm and promotes more sustainable development practices.

Ultimately, the future of global economic growth depends on how well nations can align GDP development with climate-conscious policies to ensure both economic prosperity and environmental resilience.

Q147. Which of the following is the primary trade-off mentioned in the passage between economic growth and the environment?

- (a) Economic growth increases biodiversity as industries plant trees to counteract deforestation.
- (b) Economic growth reduces employment as automation minimizes environmental damage.
- (c) Economic growth raises GDP but often harms the environment through resource depletion.
- (d) Economic growth lowers greenhouse gas emissions by encouraging low-carbon technologies.
- (e) Economic growth and environmental impact are unrelated, allowing both goals to be pursued independently.

Q148. What can be inferred about the future relationship between developed and developing nations regarding climate-conscious policies?

- (a) Developed nations will continue to grow economically without needing to adopt climate-conscious policies, as they have already established industrial dominance.
- (b) Developing nations will likely adopt climate-conscious policies faster than developed nations, as they need these policies for short-term industrial growth.
- (c) Developed and developing nations will collaborate equally on climate-conscious policies to ensure mutual economic benefits and environmental protection.
- (d) Developing nations will have no impact on global climate policies, as their economies are too small to contribute significantly to climate change.
- (e) Developed nations may have more resources to adopt climate-conscious policies, while developing nations could struggle due to their reliance on traditional industrialization for economic growth.

Q149. Why might relying solely on traditional GDP as a measure of economic growth be problematic according to the passage?

- (a) Traditional GDP overlooks technological advancements that improve sustainability and efficiency.
- (b) GDP emphasizes short-term gains, ignoring factors like population growth and urbanization.
- (c) GDP excludes environmental costs like pollution, resource depletion, and climate change.
- (d) Traditional GDP suits developed nations but doesn't reflect environmental impacts in developing countries.
- (e) GDP includes environmental degradation but downplays the role of technology in growth.

Q150. Based on the passage, what might be the primary reason that some countries resist adopting climate-conscious policies?

- (a) These policies are viewed as too expensive to implement and may slow down short-term economic growth.
- (b) Climate-conscious policies require highly advanced technologies that most countries do not have.
- (c) Countries believe that their contributions to climate change are minimal and do not justify drastic changes.
- (d) Climate-conscious policies are difficult to enforce, and nations prefer to focus on traditional industries.
- (e) These policies are only necessary for developed nations and irrelevant to developing economies.

Q151. Which of the following words must be used to fill in the given blank?

- (a) enhance
- (b) contribute
- (c) accumulate
- (d) retrieve
- (e) stimulate

Directions (152-154): In the following question, two sentences are provided, each containing a blank. Choose the most appropriate word to fill in both blanks, ensuring that the sentences are both grammatically and contextually accurate.

Q152.

- (A) The company plans to _____ training sessions to help employees develop new skills.
 (B) To ensure everyone's participation, the teacher will _____ additional resources and study materials.
 (a) demonstrate
 (b) organised
 (c) provide
 (d) make
 (e) imitate

Q153.

- (A) The government implemented new policies to _____ the effects of climate change on coastal communities.
 (B) Wearing masks and practicing social distancing can help _____ the spread of infectious diseases.
 (a) transmit
 (b) foster
 (c) malign
 (d) dominate
 (e) mitigate

Q154.

- (A) The scientist presented evidence to _____ the claims made in the previous research study.
 (B) During the debate, she was able to _____ her opponent's arguments with well-documented facts.
 (a) refute
 (b) accept
 (c) except
 (d) restore
 (e) reimburse

Directions (155-160): Read the following passage and answer the questions given below.

Given that sleeves can make or break a garment, it's surprising that there isn't much India-specific information available on the _____ of what, designer Neeta Lulla calls, "one of the pillars of a piece of clothing". In her career of 40 years, Lulla has worked as a costume designer for about 400 films, from *Lamhe* (1991) to *Devdas* (2002) and *Thalaivii* (2021). Sleeves are what "*haldi* (turmeric) and *dhaniya* (coriander)" are to food, she says. "When it comes to the evolution of sleeves in India, much of the influence has come from the West," says Lulla. "Traditionally, we mostly had slim sleeves with motifs and symbols." Why is sleeve mania in vogue? "Fashion moves in a cyclical way so we are seeing all kinds of sleeves right now," replies Lulla. "But you can't forget their functional aspect."

In fashion, nothing is ever just fashion. Each aspect of a garment serves a purpose. In many versions of the abaya, for example, the sleeves are comfortably bell shaped so the outfit becomes more airy. "Traditionally, European clothes had a strong presence of heavy cuffs and power shoulders to provide protection from the weather," Rimple offers another example.

During the 1500s and 1600s, puff sleeves became famous because of their "cosmetic" use. "The Elizabethan and Victorian eras saw the emergence of puff sleeves. Women would wear corsets to get tiny waists, and when big sleeves were added, they made the person look even smaller and achieve that perfect hourglass shape. Then you had the Edwardian sleeves that were romantic with ruffles and lace," explains Lulla. She explains how she used three-quarter, puff sleeves in the romance-drama *Lamhe* to give Sridevi's character Pallavi a soft, feminine and youthful look. "This (the Renaissance period) was the time when women's fashion, especially sleeves, was at the forefront."

The same puff sleeves became a trend in 1950s India when the country's cinema was taking shape, hence influencing popular culture. "India had recently gained independence from Britain and the presence of Edwardian sleeves was everywhere, especially in Kolkata (since it had been one of the leading cities in British times)," says Lulla, who has been studying sleeves for decades.

Q155. How did India's cultural context in the 1950s contribute to the popularity of Edwardian sleeves, as mentioned in the passage?

- (a) Indian designers incorporated elements of Edwardian fashion into cinema to reflect popular Western trends.
- (b) Indian designers rejected traditional sleeves in favor of Western styles post-independence.
- (c) A revival of interest in traditional Indian designs led to the popularity of Edwardian-style sleeves.
- (d) Western designers introduced Edwardian sleeves to Indian cinema during the 1950s.
- (e) The enduring impact of British colonial influence shaped Indian fashion trends.

Q156. Which of the following statements are ACCURATE with respect to the passage?

- (I) During the 1500s and 1600s, puff sleeves became famous because of their practical use.
- (II) Edwardian sleeves were characterized by their romantic style with ruffles and lace.
- (III) Puff sleeves emerged during the Elizabethan and Victorian eras.
- (a) All (I), (II) and (III)
- (b) Only (I) and (III)
- (c) Only (II) and (III)
- (d) Only (I) and (II)
- (e) Only (II)

Q157. What purpose do design elements such as sleeves and shoulders in garments serve, according to the passage?

- (a) They primarily contribute to the visual impact of the garment, with the focus being more on the stylistic appeal.
- (b) They are incorporated to draw attention to the historical evolution of fashion, emphasizing past trends.
- (c) They are mainly designed based on cultural and symbolic meanings, with less emphasis on practical applications.
- (d) They combine style and purpose, offering visual appeal while also serving functional needs like protection and comfort.
- (e) They are intentionally included to create a uniform style across various geographical regions and time periods.

Q158. How does Neeta Lulla view the significance of sleeves, and how did she use them in Lamhe to enhance Pallavi's character?

- (a) Sleeves are key to Indian fashion, and Lulla used full-length sleeves for a sophisticated look.
- (b) Sleeves are decorative, and Lulla used puff sleeves to give Pallavi a strong, dominant appearance.
- (c) Sleeves are essential, and Lulla used three-quarter puff sleeves to create a soft, feminine, youthful look.
- (d) Sleeves are irrelevant, and Lulla used sleeveless designs to reflect Pallavi's modernity.
- (e) Sleeves are outdated, and Lulla avoids using them in her designs.

Q159. Which of the following words can grammatically and contextually complete the blank in the passage?

- (a) emerge
- (b) transition
- (c) transformed
- (d) evolution
- (e) ebbing

Q160. Which of the following statements are INCORRECT with respect to the passage?

- (I) Lulla attributes the evolution of sleeves to Western influence.
- (II) Traditionally, we mostly had wide sleeves with plain designs but lot of motifs.
- (III) Fashion is cyclical, so we're seeing various sleeve styles now.
- (a) Only (I) and (III)
- (b) Only (II) and (III)
- (c) Only (III)
- (d) Only (II)
- (e) All (I), (II) and (III)

Q161. The one root of equation $P^2 - 10P + 25 = 0$ is y and $\frac{y}{5} = \frac{11}{z+1}$.

Quantity I. $10z$

Quantity II. 100

- (a) Quantity I > Quantity II
- (b) Quantity I < Quantity II
- (c) Quantity I \geq Quantity II
- (d) Quantity I \leq Quantity II
- (e) Quantity I = Quantity II or no relation

Q162. The age of A after four years and the present age of B is in the ratio 5:6 respectively. B is 12 year younger than C and the average of the present ages of A, B and C is 65.

Quantity I. 440

Quantity II. 6 times the sum of the present ages of B and C.

- (a) Quantity I > Quantity II
- (b) Quantity I < Quantity II
- (c) Quantity I \geq Quantity II
- (d) Quantity I \leq Quantity II
- (e) Quantity I = Quantity II or no relation

Directions (3 - 6): In each of these questions a number series is given. In each series only one number is wrong. Find out the wrong number.

Q163. 1600, 1604, 1544, 1760, 1248, 2248

- (a) 1600
- (b) 1544
- (c) 1760
- (d) 2248
- (e) 1604

Q164. 275, 75, 165, 33, 99, 19.8

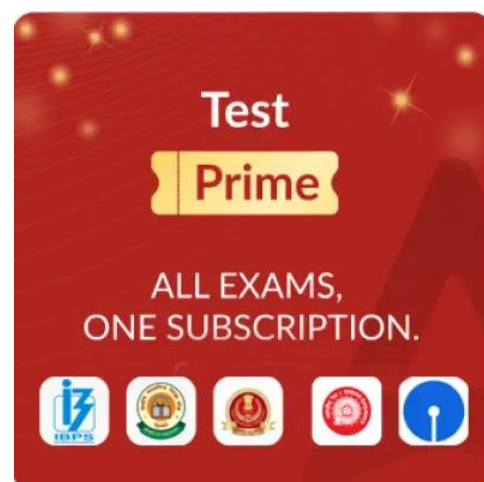
- (a) 99
- (b) 165
- (c) 75
- (d) 19.8
- (e) 275

Q165. 20000, 500, 25, 1.5, 0.5, 0.2

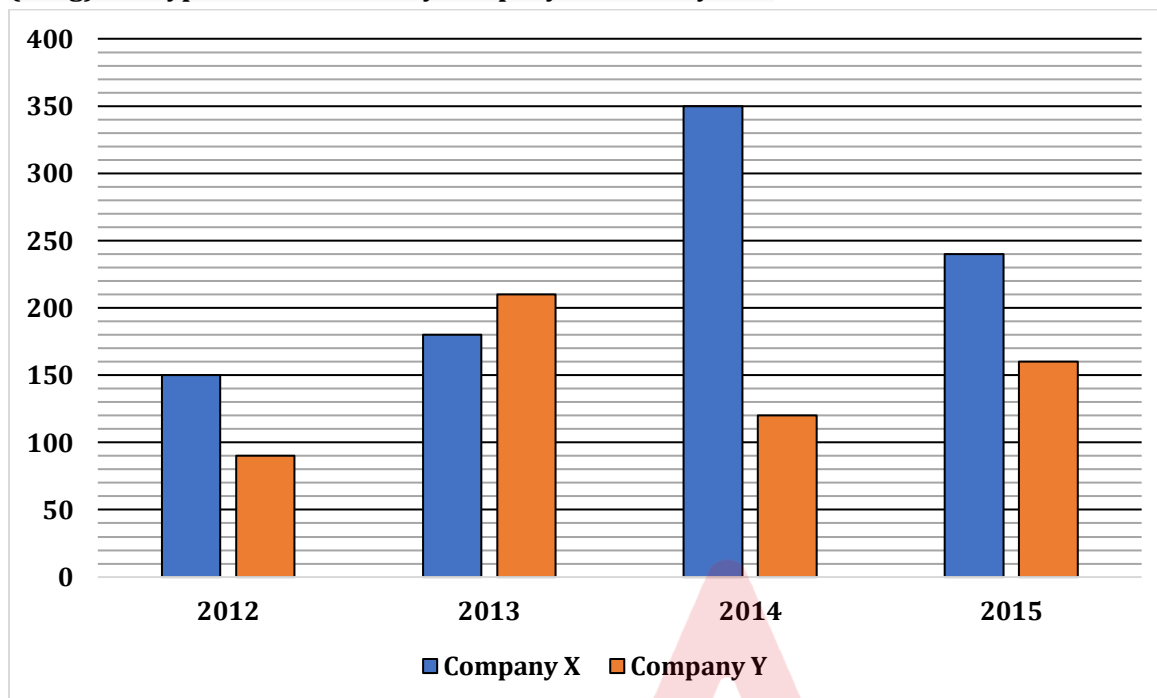
- (a) 1.5
- (b) 500
- (c) 25
- (d) 0.5
- (e) 0.2

Q166. 1001, 934, 863, 790, 711, 630, 539

- (a) 539
- (b) 790
- (c) 1001
- (d) 630
- (e) 790



Directions (167-172): Read the following bar graph and table carefully and answer the questions given below. The bar graph shows the total (type A and type B) quantity (in kg) of ore extraction by two different companies (X and Y) in four different years. The table shows the percentage of A type ore extraction by company X and the quantity (in kg) of B type ore extraction by company Y in these years.



Years	Percentage of A type ore extraction by company X	Quantity (in kg) of B type ore extraction by company Y
2012	40%	30
2013	50%	135
2014	60%	75
2015	75%	90

Q167. Total quantity of A type ore extraction by Y in 2014 and 2012 together is what percentage of the total quantity of B type ore extraction by X in 2014 and 2015 together?

- (a) 48.5%
(b) 60%
(c) 52.5%
(d) 25%
(e) 41.33%

Q168. Total quantity of A type ore extraction by Y in 2017 is $66\frac{2}{3}\%$ more than that in 2012. Total quantity of B type ore extraction by Y in 2017 half of the total quantity of A type ore extraction by X in 2015, then find the total quantity of ore extraction by Y in 2017 is how much more or less than the total quantity of ore extraction by X in 2012.

- (a) 15 kg
(b) 10 kg
(c) 30 kg
(d) 25 kg
(e) 40 kg

Q169. B type ore extraction by company X in 2013 and 2011 is in the ratio of 18:13. If the A type ore extraction by company X in 2015 is 20% more than that in 2011, then find the ratio of the total quantity of ore extraction by company X in 2011 to total quantity of ore extraction by company Y in 2014.

- (a) 43:22
- (b) 42:25
- (c) 41:29
- (d) 43:24
- (e) None of these

Q170. The average of the A type ore extraction by company X in 2012, 2013 and 2017 is 73. The total quantity of ore extraction by company X in 2017 is 1.5 times that of company Y in 2015. Find the B type ore extraction by company X in 2017.

- (a) 171 kg
- (b) 184 kg
- (c) 193 kg
- (d) 111 kg
- (e) 129 kg

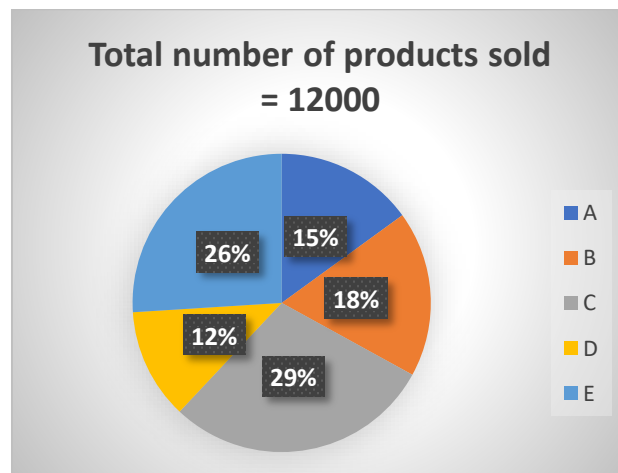
Q171. Find the difference between the total B type ore extraction by company X in 2013 and 2015 together and the sum of the A type ore extraction by company X in 2012 and A type ore extraction by company Y in 2014.

- (a) 50 kg
- (b) 45 kg
- (c) 30 kg
- (d) 35 kg
- (e) 20 kg

Q172. D type ore extraction by company X in 2016 is 25% more than the average of the A type ore extraction by company Y in 2012, 2013 and 2014. If the D type ore extraction by company Y in 2016 is two-fifth of the A type ore extraction by company X in 2013, then find the D type ore extraction by companies X and Y together in 2016.

- (a) 150 kg
- (b) 145 kg
- (c) 130 kg
- (d) 111 kg
- (e) 120 kg

Directions (173-178): Read the following pie charts carefully and answer the questions given below. The pie chart I shows the percentage distribution of the total number of products manufactured, and the pie chart II shows the percentage distribution of the total number of products sold by five different companies in 2022.



Q173. Find the total number of unsold products of A, B and C together.

- (a) 4560
- (b) 3450
- (c) 3645
- (d) 4125
- (e) None of these

Q174. The average number of products manufactured by B, D and F is 2500. If the total products sold by F is $33\frac{1}{3}\%$ that of A, then find the total number of unsold products by F.

- (a) 1750
- (b) 1900
- (c) 1400
- (d) 1550
- (e) 1200

Q175. The total number of products manufactured by A in 2023 is increased by 37.5% compared to the previous year. If the total number of unsold products by A in 2023 is the same as 2022, then find the percentage increase in the number of products sold by A in 2023 compared to the previous year.

- (a) 82.5%
- (b) 66.67%
- (c) 83.33%
- (d) 33.33%
- (e) 12.5%

Q176. Find the difference between the total number of products sold by D and E together and the total number of products unsold by C and A together.

- (a) 620
- (b) 540
- (c) 840
- (d) 775
- (e) 590

Q177. The total number of products manufactured by X is 40% less than that by E and the ratio of the unsold products by X to B is 11:7 respectively. The number of products sold by X is what percentage of the number of products manufactured by C.

- (a) 18.5%
- (b) 12.33%
- (c) 56.2%
- (d) 32.8%
- (e) 45.6%

Q178. 75% of the total number of products manufactured by E are non-defective, and the rest are defective. If $\frac{2}{5}$ th of the defective products manufactured by E are unsold, then find the ratio of the total non-defective products sold to the total non-defective products unsold by E.

- (a) 37:38
- (b) 38:39
- (c) 37:39
- (d) 38:35
- (e) 33:37



Q179. The height of a cone is equal to the height of a cylinder. The curved surface area of the cylinder is 616 cm^2 and the height of the cylinder is two times of the its radius. The radius of the cone is 50% of the radius of the cylinder.

Quantity I: Find the difference between total surface area and curved surface area of the cylinder.

Quantity II: Find the curved surface area of the cone.

- (a) Quantity I > Quantity II
- (b) Quantity I < Quantity II
- (c) Quantity I \geq Quantity II
- (d) Quantity I \leq Quantity II
- (e) Quantity I = Quantity II or no relation

Q180. A and B invested Rs X-5000 and Rs X+2000 in a compound interest for R% and 2R%, respectively, for two years. If the ratio of the investment of A and B is 5:7, then find the difference between their interest.

- (a) Rs 1200
- (b) Rs 1500
- (c) Rs 2100
- (d) Can't be determined
- (e) None of these

Q181. The cost price and selling price of an article are Rs a and Rs 2a, respectively, and the article is marked up by Rs 700 above the cost price. If the selling price and cost price of the article are increased by Rs 100 and marked price is same, then find the difference between the new discount and new profit on the article. ($a = 25^2 - 125$)

- (a) Rs 550
- (b) Rs 800
- (c) Rs 650
- (d) Rs 250
- (e) Rs 400

Q182. A, B and C together can complete a work in $P/13$ days and A & B together can complete the same work in $P/10$ days. If B alone can complete the work in $P/4$ days and days taken by C to complete the work is 20 days more than that of A, then find P.

- (a) 150
- (b) 120
- (c) 140
- (d) 110
- (e) 160

Q183. Rahul invested Rs X and Vikas invested Rs 7000 in a business. After five months, Rahul increased his initial investment by 50% and after two more months, Vikas decreased his investment by 30%. At the end of a year, the profit share of Rahul is Rs 1550 out of total profit of Rs 3020. Find the value of X.

- (a) 2500
- (b) 3000
- (c) 4000
- (d) 5000
- (e) 6000

Q184. The unit digit of a three-digit number is two more than its tenth place digit. If we subtract 311 from the number, then we receive 13 as the resultant. Find the sum of all three digits of the number.

- (a) 13
- (b) 10
- (c) 9
- (d) 11
- (e) 12

Directions (25 – 27): Read the information carefully and answer the questions given below.

The total number of sold flats in society A was $1.5x$ more than the number of unsold flats in the same society. All the flats were sold in society C, while the number of sold flats in society B are 42 which is $\frac{3}{10}$ th of the total number of flats (sold + unsold) in society C. If we doubled the number of flats (sold + unsold) in society A, then the total number of flats (sold + unsold) in all three societies becomes 612. Total unsold flats in society B is 78.

Q185. If total unsold flats in society A are 61, then find the value of x ?

- (a) 54
- (b) 36
- (c) 115
- (d) 72
- (e) 48

Q186. Out of total unsold flats from society B, 28 were sold, then find the ratio of total unsold flats in society B now to total sold flats in society B now & C together?

- (a) 7 : 21
- (b) 4 : 21
- (c) 5 : 18
- (d) 5 : 21
- (e) None of these

Q187. If total number of sold flats in society D are $\frac{1}{4}$ th of total flats (sold + unsold) in society A, then find the difference between total sold flats in society in D and C?

- (a) 100
- (b) 104
- (c) 106
- (d) 86
- (e) 96

Q188. The speed of train A is 180 km/hr and the train can cross a pole in 4 seconds. Train A can cross a man who sitting in train B in 10 seconds, while both train running in same direction.

Quantity I: Speed of train B (in m/sec.).

Quantity II: If speed of train A is decrease by 20 m/sec., then find the new speed of train A (in m/sec.)

- (a) Quantity I > Quantity II
- (b) Quantity I < Quantity II
- (c) Quantity I \geq Quantity II
- (d) Quantity I \leq Quantity II
- (e) Quantity I = Quantity II or no relation

Q189. The length of train A is 'd' meters which takes equal time to cross a 300 meters long platform in which 'd+200' meters long train B can cross a 500 meters long platform. If the ratio of speed of train A to that of train B is 5 : 9, then find the value of 'd' (in meters).

- (a) 200
- (b) 100
- (c) 300
- (d) 250
- (e) 120

Q190. A, B and C has total 60 toffies, while A has 25 toffies and total number of toffies C has is 5 less than that of B. Find how many toffies should be added with C, so that the ratio of toffies A, B and C has becomes 5 : 4 : 6 respectively.

- (a) 20
- (b) 10
- (c) 15
- (d) 5
- (e) 25

Q191. The monthly income of a person is Rs 30000, he spends $a\%$ on rent and $a+5\%$ on EMI. He spends 45% of the remaining income on education. If amount spent on education is equal to amount spent on rent, then find the amount spent on EMI (in Rs.)?

- (a) 7250 Rs
- (b) 8150 Rs
- (c) 6250 Rs
- (d) 8250 Rs
- (e) None of these

Q192. The sum of perimeter of top and bottom of a right circular cylinder is 176 cm. If volume of the cylinder is $3528\pi \text{ cm}^3$ and the height of the cylinder is $\frac{3}{4}$ th of side of square, then find the area of the square (in cm^2)?

- (a) 900
- (b) 784
- (c) 676
- (d) 576
- (e) 484

Q193. A sum is invested at 12% p.a. at simple interest for four years 11 months and 28 days in a scheme. The amount received from the scheme is invested for two years at 20% p.a. on compound interest for two years 2 days in another scheme. If compound interest received from second scheme is 1056.4 Rs, then find the amount invested in first scheme (approx.)?

- (a) 1400 Rs
- (b) 1800 Rs
- (c) 1600 Rs
- (d) 1500 Rs
- (e) 1200 Rs

Q194. The ratio of present age of A to that of B is 1 : 3. One year ago, the age of C was twice the age of A that time. If B is 21 years older than C, then find the ratio of present age of B to age of C after three years.

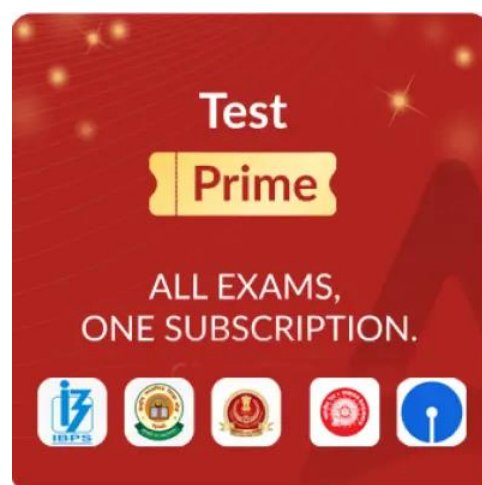
- (a) 10 : 9
- (b) 7 : 5
- (c) 9 : 7
- (d) 5 : 3
- (e) 10 : 7

Q195. A boat travelled $\frac{3x}{5}$ km in downstream and $\frac{2x}{5}$ km in upstream. Speed of boat in still water is 12 km/hr and speed of stream is 8 km/hr and time taken by boat to cover given distance in upstream is 14 hours more than of time taken by boat to cover given distance in downstream. Find the total distance travelled in downstream?

- (a) 220 km
- (b) 155 km
- (c) 182 km
- (d) 70 km
- (e) 120 km

Direction (196-200): Read the information and answer the following questions.

There are three people A, B and C bought the same article at different price. A bought an article at Rs. Y and B bought the same article at 50% more cost than that of A. C bought the same article at 100% above cost than that of A. The d% discount is given on the article by A also he gets a profit of Rs.40 and A marked up the article Rs. 100 above the cost price. The cost price of the article bought by B is five time the discount given by A on the article.



Q196. Find the value of d.

- (a) 20%
- (b) 18%
- (c) 11%
- (d) 15%
- (e) 10%

Q197. Find the value of Y.

- (a) Rs 200
- (b) Rs 180
- (c) Rs 125
- (d) Rs 100
- (e) Rs 150

Q198. If A invested 40 times of profit he received from the article in a scheme which offers a simple interest of 15% for 5 years, then find the interest received by A.

- (a) Rs 1221
- (b) Rs 1000
- (c) Rs 1100
- (d) Rs 1300
- (e) Rs 1200

Q199. If C marked the article 30% above the cost price and gives a discount of Rs 49, then find the selling price of article A is how much more/less than the selling price of C.

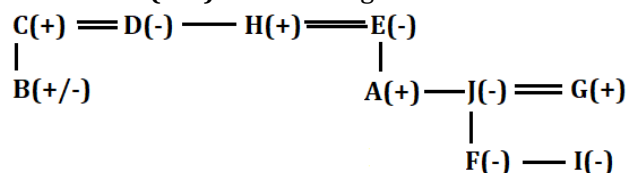
- (a) Rs 221
- (b) Rs 181
- (c) Rs 191
- (d) Rs 231
- (e) Rs 200

Q200. B gets the profit double than that of C on the article they bought. Now C and B get into a partnership by investing their profits that they get from the article they bought for X months and 12 months and received a profit share in the ratio of 1:6 respectively. Find the value of X.

- (a) 3 months
- (b) 6 months
- (c) 10 months
- (d) 4 months
- (e) 5 months

Solutions

Directions (1-3): Final arrangement –

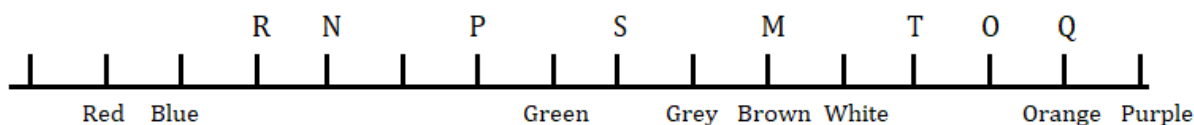


S1. Ans. (e)

S2. Ans. (c)

S3. Ans. (b)

Directions (4-8):



S4. Ans. (b)

S5. Ans. (d)

S6. Ans. (e)

S7. Ans. (a)

Sol. Two persons gap between all options except option (a)

S8. Ans. (c)

Directions (9-11):

S9. Ans. (d)

S10. Ans. (e)

S11. Ans. (e)

Directions (12-14):

S12. Ans.(b)

Sol. If both statements I and statement II together are sufficient 'zn' is the code for the word 'Library'

Word	Code
New	Px
Books/are/important	Rt/uv/md
Now	Gt
Library	Zn
Open	Cx
Is	Yb
City	lq

Test
Prime

ALL EXAMS,
ONE SUBSCRIPTION.

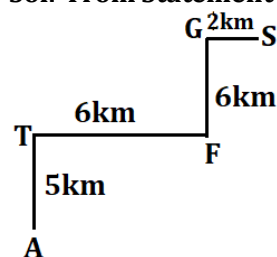
S13. Ans.(a)

Sol. From Statement I:

Floors	Persons
6	A
5	D
4	B
3	E
2	C
1	F

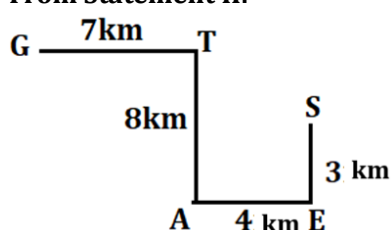
S14. Ans.(c)

Sol. From Statement I:



South-west

From Statement II:



North-west

Directions (15-19):

Final Arrangement:

Years	Ages	Persons	Countries
1961	63	G	Switzerland
1964	60	E	Armenia
1968	56	A	Sweden
1975	49	B	Poland
1982	42	C	Latvia
1986	38	F	Bangladesh
1994	30	D	Denmark

S15. Ans.(c)

S16. Ans.(b)

S17. Ans.(e)

S18. Ans.(d)

S19. Ans.(b)

S20. Ans.(e)

Sol. Argument I is strong because faster transportation and economic boost are directly related to the benefits of new highways. Argument III is also strong because it points out job creation and development, which are key benefits of new infrastructure. However, Argument II is not as strong because although maintenance is important, it doesn't outweigh the long-term benefits of new highways.

S21. Ans.(c)

Sol. Both I and III are strong arguments because ensuring no long-term environmental harm and engaging communities for sustainable development are important and directly related to the project's impact. Argument II is weak since while cost and economic progress are important, they do not necessarily justify skipping critical environmental and social checks.

S22. Ans.(a)

Sol. COURTEOUS= OREU = EORU

Directions (23-27):

Final Arrangement:

Boxes	Items
U	Mirror
S	Cups
Q	Strings
V	Wires
P	Gloves
T	Glasses
R	Rope
W	Jar

S23. Ans.(d)

S24. Ans.(c)

S25. Ans.(a)

S26. Ans.(c)

S27. Ans.(b)

S28. Ans.(e)

Sol. In the statement, the government emphasizes diplomatic talks for a long-term solution, implying that they believe in diplomacy (Assumption I). At the same time, defence readiness as a precaution implies that the possibility of military escalation exists, even with diplomatic efforts (Assumption II). Therefore, both assumptions are implicit.

S29. Ans.(b)

Sol. The statement talks about infrastructure development along the border, with the belief that it will benefit local populations economically. Therefore, assumption (b) is implicit as it directly relates to the claim made in the statement.

Directions (30-34):

Logic here is: Pick and arrange the even numbers in ascending order and place them in extreme left end after adding 5 to that number and pick and arrange the odd numbers in descending order and place them in extreme right end after subtracting 5 from that number.

Final Arrangement:

Input: 60 53 46 12 91 82 77 66 21 37

Step 1- 17 60 53 46 82 77 66 21 37 86

Step 2- 51 17 60 53 82 66 21 37 86 72

Step 3- 65 51 17 82 66 21 37 86 72 48

Step 4- 71 65 51 17 82 21 86 72 48 32

Step 5- 87 71 65 51 17 86 72 48 32 16

S30. Ans.(d)

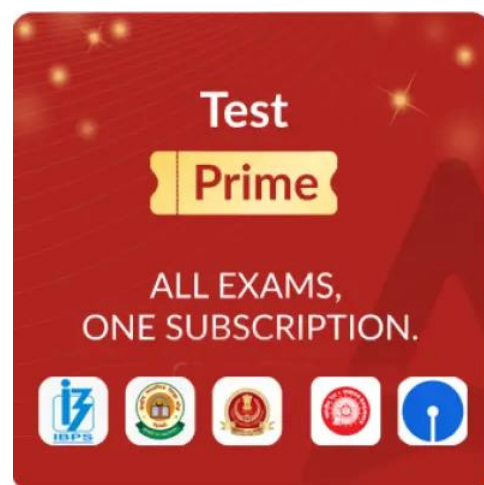
Sol. $37+53=90$

S31. Ans.(b)

Sol. 87 51 72 48

S32. Ans.(c)

Sol. $65-48 = 17$



S33. Ans.(e)

S34. Ans.(c)

S35. Ans.(c)

Sol. MAGNANIMOUS = GIOUS = FJPVR

S36. Ans.(a)

Sol. The statement mentions that the new immigration system is aimed at attracting skilled workers and provides for quicker visa approvals, which supports conclusion I. However, the statement does not say that only high-demand field workers are eligible, so conclusion II does not follow.

S37. Ans.(c)

Sol. The statement specifically mentions that the points-based system prioritizes skills and qualifications, as well as age, which supports option (c). However, there is no evidence in the statement that labour shortages will no longer be an issue, and while younger applicants may benefit more, the statement does not conclusively state this.

Directions (38–40):

Final Arrangement:

	R 48	P 29	S 37	Q 22
Row 2				
Row 1				
	D 64	B 25	C 34	A 16

S38. Ans.(b)

Sol. Except B, all the other persons have even number of chocolates.

S39. Ans.(e)

Sol. Sum of the number of chocolates S+B+C have is $37+25+34=96$

S40. Ans.(c)

Sol. P is related to C, logic here is first person sits immediately to the right of the one who sits opposite to second person.

S41. Ans.(c)

Sol. The document is temporarily stored in **RAM** (Random Access Memory) while working on a PC. RAM is volatile memory, which means it stores data only when the computer is powered on. It allows for quick access to data and is used to hold the data temporarily until the user saves the document or closes the application. When the system is turned off, all data in RAM is lost unless saved to a more permanent storage medium like a hard disk.

Important Key Points:

1. **RAM** is responsible for temporary storage of active documents and processes.
2. Data in RAM is lost when the computer is powered off, making it volatile memory.

Knowledge Booster:

- **Hard Disk:** Used for permanent data storage, not temporary storage during active sessions.
- **CD-ROM:** A read-only storage medium, not suitable for temporary or active document storage.
- **ROM:** Non-volatile memory that contains firmware; it's not used for document storage.
- **USB Drive:** A portable storage device used for transferring and saving data, not for temporary storage during active use.

S42. Ans.(c)

Sol. The main purpose of **Microsoft Access** is to serve as a **Database Management System (DBMS)**. It is designed to create and manage databases, enabling users to store, retrieve, and organize large volumes of data. Microsoft Access provides tools for database design, query building, and reporting, making it ideal for small-scale to medium-sized database solutions.

Important Key Points:

1. **Microsoft Access** is used for managing relational databases, supporting forms, queries, and reports.
2. It allows for easy data entry and retrieval, making it a powerful tool for database management tasks.

Knowledge Booster:

- **Word Processing** is the function of Microsoft Word, not Microsoft Access.
- **Spreadsheet Creation** is handled by Microsoft Excel, which specializes in data analysis, not database management.
- **Graphic Design** is managed by specialized software like Adobe Photoshop or CorelDRAW, not Microsoft Access.
- **Email Management** is the primary function of Microsoft Outlook, not Microsoft Access.

S43. Ans.(c)

Sol. A **Flip-Flop** is a basic memory element used in digital circuits to store a single bit of data. It is a type of bistable circuit, meaning it has two stable states (0 and 1), and it is commonly used in memory devices, counters, and shift registers. Flip-flops are fundamental building blocks for sequential logic circuits in digital systems.

Important Key Points:

1. **Flip-Flop** is a circuit that can maintain a stable state, representing either a 0 or 1, and is commonly used in memory elements.
2. It is used to store data temporarily in digital systems, particularly in memory storage and processing tasks.

Knowledge Booster:

- **Register:** Registers are groups of flip-flops used to store multiple bits of data temporarily.
- **Cache:** A high-speed memory component, not used for storing individual bits but for frequently accessed data.
- **RAM:** Random Access Memory stores data temporarily while the system is running, but individual bits are often stored using flip-flops in its internal design.
- **SSD:** Solid State Drives are non-volatile storage devices, storing large amounts of data but no single bits like flip-flops.

S44. Ans.(d)

Sol. To convert the binary number $(101010)_2$ into decimal, we apply the binary-to-decimal conversion method by multiplying each bit by 2 raised to the power of its positional index (starting from 0 on the right).

$$(101010)_2 = 1 \times 2^5 + 0 \times 2^4 + 1 \times 2^3 + 0 \times 2^2 + 1 \times 2^1 + 0 \times 2^0$$

$$(101010)_2 = 32 + 0 + 8 + 0 + 2 + 0$$

$$(101010)_2 = 42$$

Thus, the decimal equivalent of $(101010)_2$ is **42**.

Important Key Points:

1. Binary-to-decimal conversion involves multiplying each bit by powers of 2, starting from the rightmost bit.
2. This conversion method is essential in computing, especially in low-level data operations.

Knowledge Booster:

- **Binary System:** It is a base-2 numeral system consisting of only 0s and 1s, which is fundamental in computer operations.
- **Decimal System:** It is a base-10 numeral system, the standard system used for representing integer values in daily life.
- **Octal System:** Another numeral system with a base of 8, often used in computing, especially in legacy systems.
- **Hexadecimal System:** A base-16 numeral system widely used in programming and computing to represent large binary numbers in a more compact form.

S45. Ans.(d)

Sol. The **First Generation** of computers used **vacuum tubes** as the primary technology for circuitry. These computers were large, consumed a lot of electricity, and produced significant heat. Examples of first-generation computers include the ENIAC and UNIVAC. The vacuum tubes acted as electronic switches but were unreliable and prone to frequent failures.

Important Key Points:

1. **First Generation** computers (1940–1956) used vacuum tubes for processing.
2. These computers were known for their large size, heat production, and high energy consumption.

Knowledge Booster:

- **Second Generation:** Computers in this generation used transistors instead of vacuum tubes, which made them smaller and more reliable.
- **Third Generation:** Integrated Circuits (ICs) replaced transistors, further reducing the size and increasing the efficiency of computers.
- **Fourth Generation:** Microprocessors became the defining technology, integrating thousands of ICs on a single chip.
- **Fifth Generation:** Focuses on artificial intelligence (AI) and advanced parallel processing, moving away from traditional hardware components like vacuum tubes and transistors.

S46. Ans.(b)

Sol. The **Accumulator** is a specialized register in the CPU that temporarily stores intermediate results while the **Arithmetic Logic Unit (ALU)** performs calculations. It is designed to quickly access and store data during processing, reducing the need to repeatedly access slower memory components, making the overall operations faster.

Important Key Points:

1. The **Accumulator** serves as a temporary storage location for ALU operations, holding intermediate results for faster processing.
2. It plays a crucial role in speeding up computations by minimizing data transfers between the CPU and main memory.

Knowledge Booster:

- **RAM:** It holds data for active applications, but it is slower than registers like the accumulator and is not directly used for storing ALU results.
- **Control Unit:** It directs the operation of the CPU but does not store data during ALU operations.
- **ROM:** Read-Only Memory stores firmware and cannot be used for temporary data storage in ALU operations.

S47. Ans.(d)

Sol. **Python** is a programming language and is **not** a hardware component. It is a high-level, general-purpose programming language used to develop software and applications. Hardware, on the other hand, refers to the physical components of a computer system, such as a hard disk, monitor, and motherboard.

Important Key Points:

1. **Python** is a software tool used for writing code, not a physical device or component.
2. **Hardware** includes tangible, physical components like hard drives, monitors, and motherboards that make up a computer system.

Knowledge Booster:

- **Hard Disk:** A physical storage device used for storing data in computers.
- **Monitor:** A hardware device used to display output from a computer.
- **Printer:** A peripheral device that produces physical copies of digital documents.
- **Motherboard:** The central circuit board that connects and facilitates communication between all the components of a computer.

S48. Ans.(b)

Sol. The **Star Mark** feature is used in email services to mark important emails for easy access. By adding a star to an email, users can quickly identify and prioritize their important messages, ensuring that they are easy to find and follow up on later.

Important Key Points:

1. The **Star Mark** helps users organize their inbox by highlighting important emails.
2. This feature is widely available in popular email platforms such as Gmail to streamline inbox management.

Knowledge Booster:

- **Archive:** Moves emails out of the inbox but does not highlight important emails.
- **Draft:** Refers to emails that have been written but not yet sent, not used for marking important messages.
- **Folder:** Helps in organizing emails but doesn't specifically mark them as important.
- **Priority Label:** Labels emails based on importance but differs from the star mark, which visually highlights specific emails.

S49. Ans.(c)

Sol. The statement "**Data is lost after the PC is off**" is **incorrect** for non-volatile memory. Non-volatile memory retains data even when the power is turned off. This type of memory is designed to store data permanently until it is intentionally erased or overwritten, which is why it is used in devices like SSDs, hard drives, and USB drives.

Important Key Points:

1. **Non-volatile memory** retains data without requiring power, making it ideal for permanent storage.
2. It is commonly used in storage devices like SSDs, hard drives, and flash drives.

Knowledge Booster:

- **Data is retained even after the PC is turned off:** This is the defining feature of non-volatile memory.
- **It is commonly used for long-term storage:** Non-volatile memory is designed for retaining data long-term, unlike volatile memory like RAM.
- **Non-volatile memory includes SSDs and Hard Drives:** Both of these are examples of non-volatile storage devices.
- **It is slower than volatile memory like RAM:** This is true because non-volatile memory typically operates at slower speeds compared to volatile memory, which is optimized for fast access during active processes.

S50. Ans.(b)

Sol. The primary use of **middleware** is to facilitate the processing of multiple synchronous transactions between applications. Middleware acts as an intermediary, allowing different systems to communicate and coordinate tasks, especially in distributed or networked environments. This ensures smooth data exchange and interaction between various applications, even when they operate in different environments.

Important Key Points:

1. Middleware supports real-time communication between applications, allowing for efficient processing of multiple transactions simultaneously.
2. It helps in managing communication, authentication, and transaction coordination in distributed systems.

Knowledge Booster:

- **Middleware is not responsible for managing hardware resources:** It focuses on software communication rather than hardware management.
- **Direct access to system memory** is handled by low-level processes, not middleware.
- **Data storage** is not the primary function of middleware; it is mainly concerned with facilitating communication.
- **User interface design** is not part of middleware's functionality; this is handled by front-end software development.

S51. Ans.(d)

Sol. The technology used for Bitcoin transactions is **Blockchain**. Blockchain is a decentralized and distributed ledger technology that records all transactions across a network of computers. It ensures that Bitcoin transactions are secure, transparent, and tamper-proof. Every transaction is verified by nodes in the network and added to a block, which is then added to the existing chain of blocks, creating an immutable record of transactions.

Important Key Points:

1. **Blockchain** is the backbone technology for Bitcoin and most other cryptocurrencies, ensuring secure, decentralized transaction processing.
2. The transparency and immutability of blockchain prevent double-spending and unauthorized alterations to the transaction record.

Knowledge Booster:

- **Machine Learning:** This is a subset of AI focused on data-driven predictions but is not used for Bitcoin transaction processing.
- **Artificial Intelligence (AI):** While AI is revolutionizing many industries, it is not directly involved in processing Bitcoin transactions.
- **Data Mining:** In cryptocurrency, "mining" refers to the process of verifying and adding transactions to the blockchain, but data mining (pattern discovery) is not the same.
- **Cloud Computing:** Although used for storage and processing in various applications, cloud computing does not handle Bitcoin transaction verification.

S52. Ans.(b)

Sol. A **Trojan** (or Trojan Horse) is a type of malicious software that appears to be legitimate or harmless but can actually cause harm to your computer or network. Trojans are often disguised as useful software or files, tricking users into installing them. Once installed, they can open a backdoor for hackers to gain access to the system, steal information, or cause other damage.

Important Key Points:

1. **Trojan** malware does not replicate itself like viruses but can cause significant damage by allowing unauthorized access.
2. Trojans are commonly used to steal data, gain control of systems, or install additional malware.

Knowledge Booster:

- **Virus:** A virus replicates itself and spreads to other programs or systems, causing damage by corrupting or deleting files.
- **Worm:** A worm is a type of malware that spreads through networks, often causing disruption by consuming bandwidth, but it doesn't disguise itself as legitimate software.
- **Spyware:** Spyware secretly monitors user activity, but it usually doesn't disguise itself as legitimate software like Trojans do.
- **Ransomware:** Ransomware locks the user out of their system or files until a ransom is paid, but it's not typically disguised as legitimate software.

S53. Ans.(c)

Sol. **Wireless USB** is used in **Personal Area Networks (PAN)**. A PAN is a network that connects devices within a very short range, typically around a single person. Wireless USB allows for the wireless transfer of data between devices like computers, printers, cameras, and other peripherals, making it ideal for use in a PAN environment.

Important Key Points:

1. **Wireless USB** technology allows for short-range, high-speed wireless communication, ideal for personal devices in close proximity.
2. **PAN** networks are designed to support personal devices like smartphones, laptops, and wearable technology over short distances.

Knowledge Booster:

- **LAN:** Used for connecting devices within a limited area, such as a home or office, but Wireless USB is typically focused on individual device connectivity rather than LANs.
- **WAN:** A wide-area network connects devices over large geographical areas, which is not the focus of Wireless USB technology.
- **MAN:** MANs cover larger urban areas, but Wireless USB is not designed for such extensive networking.
- **SAN:** Storage Area Networks are specialized networks for data storage, unrelated to Wireless USB's personal device connectivity.

S54. Ans.(c)

Sol. **CodeRed** is **not** an antivirus software. It is a computer worm that targeted web servers running Microsoft IIS (Internet Information Services) in 2001. CodeRed exploited vulnerabilities in the web server software to spread itself across the internet, causing significant damage. Unlike antivirus programs, which are designed to protect systems from such malicious software, CodeRed was an attack that infected systems.

Important Key Points:

1. **CodeRed** is a notorious worm that exploited a vulnerability in Microsoft IIS servers in 2001.
2. It is not designed to protect computers, but rather to cause harm by replicating itself and spreading across networks.

Knowledge Booster:

- **McAfee:** One of the leading antivirus software providers, offering protection against viruses, malware, and other threats.
- **Norton:** A widely used antivirus and cybersecurity tool for protecting devices from malware.
- **Kaspersky:** Known for providing comprehensive antivirus protection against malware and cyber threats.
- **AVG:** Another popular antivirus software that provides protection against various forms of malware.

S55. Ans.(a)

Sol. The **Arithmetic Logic Unit (ALU)** is the part of the CPU responsible for performing arithmetic (addition, subtraction, multiplication, division) and logical (AND, OR, NOT, XOR) operations. It is a crucial component of the processor that handles all mathematical calculations and logical decision-making tasks during program execution.

Important Key Points:

1. The **ALU** performs all arithmetic calculations such as addition and subtraction, as well as logical comparisons.
2. It works closely with the control unit and memory to process data and execute instructions.

Knowledge Booster:

- **Control Unit:** Directs the operations of the CPU, but does not perform arithmetic or logical operations.
- **Memory Unit:** Stores data and instructions temporarily, but does not perform calculations.
- **Cache:** A small, high-speed memory that stores frequently accessed data but does not execute arithmetic or logic operations.
- **Register:** Temporarily holds data and instructions for the CPU, but the actual operations are performed by the ALU.

S56. Ans.(c)

Sol. In **MS Excel**, the **ampersand symbol (&)** is used to combine the contents of two or more cells into a single cell. This process is called **concatenation**. For example, if cell A1 contains "Hello" and cell B1 contains "World," the formula =A1 & " " & B1 will combine them into "Hello World."

Important Key Points:

1. The **ampersand (&)** symbol is a quick way to combine or concatenate text or numbers from different cells in Excel.
2. You can also use the **CONCAT function** for the same purpose, i.e., =CONCAT(A1, B1).

Knowledge Booster:

- **%:** Used to format numbers as percentages.
- **+:** Used for arithmetic addition, not for combining cell content.
- **=:** Used to start a formula in Excel.
- ***:** Used for multiplication, not concatenation.

S57. Ans.(c)

Sol. **Spyware** is a type of malware designed to **secretly** collect information about a user without their knowledge. It often tracks users' activities, including browsing habits, keystrokes, and personal information like passwords and credit card details. Spyware can be installed through malicious downloads, email attachments, or even legitimate-looking software.

Important Key Points:

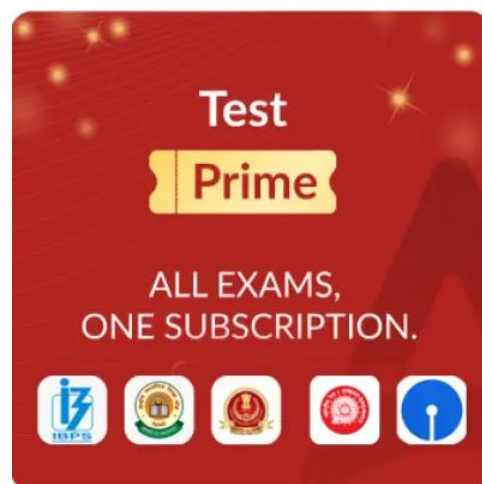
1. **Spyware** operates silently in the background, collecting personal information and transmitting it to the attacker without the user's consent.
2. It is often used for identity theft, financial fraud, or to serve targeted advertisements.

Knowledge Booster:

- **Virus:** A type of malware that replicates itself and spreads to other files, but its primary goal is not information collection.
- **Worm:** Malware that spreads across networks, usually to cause disruption rather than to collect user information.
- **Ransomware:** A type of malware that locks users out of their data or system until a ransom is paid, not for secret data collection.
- **Trojan:** Disguised as legitimate software, a Trojan grants unauthorized access but doesn't focus solely on data collection like spyware.

S58. Ans.(b)

Sol. **Cache** memory has the shortest access time compared to all other memory units, except for CPU registers. Cache is located close to the CPU and stores frequently accessed data, allowing for quicker retrieval and improved processing speeds. This significantly enhances the performance of the system by minimizing the time it takes to access data from slower memory units, such as RAM or secondary storage.



Important Key Points:

1. **Cache memory** is faster than RAM and other storage units, as it stores frequently accessed data for the CPU.
2. Cache helps in reducing latency and improving the overall performance of the system.
3. The **order of access time** for different types of memory, from fastest to slowest, is:
 - **CPU Registers** (fastest)
 - **Cache memory**
 - **Main memory (RAM)**
 - **Secondary memory** (Hard disk, SSD, etc.)

Knowledge Booster:

- **RAM:** Slower than cache but faster than secondary storage devices.
- **Hard Disk:** Much slower compared to cache and RAM, used for long-term storage.
- **SSD:** Faster than traditional hard disks but slower than cache memory.
- **CD-ROM:** Optical storage media, significantly slower in access time compared to all other memory types listed.

S59. Ans.(a)

Sol. The full form of **ATX** is **Advanced Technology eXtended**. ATX is a motherboard and power supply configuration standard that was developed by Intel in 1995. It defines the physical dimensions, mounting points, and connector interfaces for motherboards, ensuring compatibility between various computer components.

Important Key Points:

1. **ATX** is a widely adopted standard for motherboards and power supplies in desktop computers.
2. It specifies the dimensions and layout of components to ensure that motherboards fit into cases and work with standard power supplies.
3. Advanced Technology eXtended (ATX) is the successor to the earlier Baby AT form factor.
4. ATX motherboards are larger than microATX and mini-ITX boards, offering more expansion slots.
5. ATX is still the most common form factor for desktop computers.

S60. Ans.(b)

Sol. **Ransomware** is a type of **Encryption Malware**. It encrypts a user's files or locks their system, demanding a ransom to unlock or decrypt the data. This form of malware poses a serious threat by making data inaccessible until the user pays the ransom, typically in cryptocurrency, to receive the decryption key from the attacker.

Important Key Points:

1. **Ransomware** uses encryption to lock files or systems, and users must pay a ransom to regain access.
2. It is one of the most dangerous forms of malware due to its ability to render data completely unusable without the decryption key.

Knowledge Booster:

- **Application Software:** Software designed for user tasks, not malware.
- **Decryption Malware:** This option is incorrect because ransomware encrypts data; it does not decrypt it.
- **Antivirus Software:** Antivirus software detects and removes malware, but ransomware is a type of malware, not antivirus.
- **Protection Malware:** This option is misleading; malware does not offer protection—it causes harm.

S61. Ans.(a)

Sol. The **Control Unit (CU)** in a CPU is responsible for **interpreting instructions**. It fetches, decodes, and directs the execution of instructions stored in memory, ensuring the CPU functions as required. It coordinates the activities of the CPU and other components, ensuring smooth and sequential task execution.

Important Key Points:

1. The **Control Unit** interprets and controls the flow of instructions in a computer system.
2. It does not perform operations but directs other parts of the CPU to do so.

Knowledge Booster:

- **Printing data:** This is handled by the printer driver or spooler, not the Control Unit.
- **Providing internet access:** Managed by network adapters and protocols, not the CU.
- **Adjusting screen resolution:** Controlled by the graphics card and monitor settings, not the CU.
- **Compressing files:** This is handled by software programs, not the Control Unit.

S62. Ans.(c)

Sol. The most prominent and widely used IP protocols today are **IPv4 & IPv6**. **IPv4** has been the primary protocol used for internet traffic for decades. However, due to the limited address space of IPv4, **IPv6** was introduced, offering a much larger address pool and several technological improvements to handle modern internet demands.

Important Key Points:

1. **IPv4** remains widely used, while **IPv6** adoption is increasing to accommodate the growing number of devices requiring IP addresses.
2. **IPv6** includes improvements in security and routing efficiency over IPv4.

Knowledge Booster:

- **IPv2 & IPv3:** Early versions of the Internet Protocol, not widely implemented.
- **IPv5 & IPv7:** IPv5 was an experimental protocol and never fully deployed, while **IPv7** is a non-existent protocol.
- **IPv1 & IPv7:** These versions are not recognized or used in modern networking.
- **IPv2 & IPv5:** These versions are either early or experimental protocols that were not adopted.

S63. Ans.(a)

Sol. A **Rootkit** is a type of malicious software designed to provide unauthorized access to a computer system while concealing its presence. Rootkits hide their processes, files, and data, making it difficult for users and antivirus programs to detect their malicious activities. Once installed, a rootkit allows attackers to control the system, steal data, and perform other harmful actions without being detected.

Important Key Points:

1. **Rootkits** are typically used by attackers to maintain persistent access to a compromised system while hiding their activities.
2. Rootkits are often installed through phishing attacks, software vulnerabilities, or by exploiting system weaknesses.

Knowledge Booster:

- **Security Software:** Unlike rootkits, legitimate security software is designed to protect against malicious activities, not hide them.
- **System Performance Tools:** These tools are used to improve the performance of a system, but they do not conceal activities.
- **System Recovery Applications:** Used to restore systems after failure or corruption, these tools are legitimate and not malicious like rootkits.
- **Antivirus Software:** Antivirus programs are designed to detect and remove malware, including rootkits, not to hide them.

S64. Ans.(d)

Sol. A **stylus** operates using **capacitive touch** technology, which allows it to interact with touchscreen devices. Capacitive touchscreens detect the conductive properties of the stylus, enabling precise input for activities like writing, drawing, or navigating. This technology mimics the electrical conductivity of a human finger.

Important Key Points:

1. **Capacitive Touch** technology is widely used in smartphones, tablets, and touchscreen laptops for accurate input with a stylus.
2. The stylus provides more precise control than a finger, making it ideal for tasks requiring accuracy.

Knowledge Booster:

- **Laser:** Primarily used in laser pointers for presentations, not in stylus technology.
- **Pointer:** Refers to devices for directing attention during presentations but not for touch input.
- **UV Rays:** Not used in styluses; UV rays are related to light and electromagnetic radiation, not touchscreens.
- **Magnetic Field:** Some specialized devices use magnetic technology, but common styluses rely on capacitive touch.

S65. Ans.(c)

Sol. An **interrupt** allows the **CPU to temporarily halt its current task to manage urgent tasks**, such as handling input/output operations or responding to critical events. This enables the system to quickly address time-sensitive operations. Once the interrupt is managed, the CPU resumes its previous task.

Important Key Points:

1. **Interrupts** ensure that high-priority tasks, like input/output requests, are addressed immediately.
2. They allow the CPU to efficiently multitask, switching between processes as needed.

Knowledge Booster:

- **Stop CPU tasks:** This does not describe an interrupt; the CPU pauses tasks temporarily but resumes them after handling the interrupt.
- **Allocate memory:** Memory management is handled by the operating system, not interrupts.
- **Save data:** Data storage operations are unrelated to interrupts, which manage real-time tasks.
- **Protect against malware:** Interrupts do not provide security; antivirus programs are responsible for malware protection.

S66. Ans.(b)

Sol. **Extending the size of RAM** is one of the most effective ways to increase the speed of a computer. More RAM allows the system to handle more tasks simultaneously, reducing the need to rely on slower secondary storage, such as the hard disk. RAM upgrades improve multitasking, speed up applications, and enhance overall system performance.

Important Key Points:

1. **RAM** (Random Access Memory) allows the computer to store and access data quickly while performing multiple tasks.
2. Increasing RAM reduces the frequency of data being swapped to the hard drive, which is slower.

Knowledge Booster:

- **Increasing storage on the hard disk:** While increasing storage provides more space, it doesn't directly improve system speed.
- **Adding more USB ports:** This adds more connectivity options but doesn't impact computer speed.
- **Installing antivirus software:** Protects the system but does not enhance its speed.
- **Replacing the power supply:** Ensures stable power but does not affect system performance or speed.

S67. Ans.(b)

Sol. A **Graphic Tablet** is used to convert a handwritten signature into an image. This device allows users to write or draw on its surface using a stylus, and the input is captured digitally, making it ideal for creating digital signatures or artwork.

Important Key Points:

1. A **Graphic Tablet** captures handwriting or drawings and converts them into digital form.
2. It is commonly used in digital design, signature capture, and other applications that require precise hand input.

Knowledge Booster:

- **Barcode Scanner:** Scans barcodes for information retrieval, unrelated to capturing handwritten signatures.
- **Joystick:** Primarily used for gaming, not for inputting handwriting.
- **Optical Mouse:** Used for pointing and clicking but cannot capture handwritten input.
- **Trackball:** Another pointing device, similar to a mouse, with no capability to capture handwriting.

S68. Ans.(c)

Sol. **SMTP (Simple Mail Transfer Protocol)** is primarily used for **email transmission**. It is responsible for sending emails from one server to another over the internet. SMTP works by transferring mail from the sender's email client to the recipient's email server, ensuring that messages are delivered to the appropriate destination.

Important Key Points:

1. **SMTP** is the standard protocol used for sending emails across the internet.
2. It is typically used in conjunction with other protocols like POP3 or IMAP, which are responsible for receiving emails.

Knowledge Booster:

- **File Transfer:** This is typically handled by FTP (File Transfer Protocol), not SMTP.
- **Web Browsing:** HTTP/HTTPS are used for browsing the web, not SMTP.
- **Data Encryption:** Encryption is handled by protocols like SSL/TLS, not SMTP directly.
- **Remote Access:** This is managed by protocols such as SSH or RDP, unrelated to SMTP.

S69. Ans.(c)

Sol. UNIX is a **system software** that functions as an operating system. It manages hardware resources, provides a platform for applications to run, and facilitates user interaction with the system. Operating systems like UNIX control the core functions of a computer, such as file management, process management, and memory management.

Important Key Points:

1. **System Software** includes operating systems like UNIX, which are essential for managing hardware and software resources.
2. UNIX is widely used in servers, workstations, and other systems requiring a stable, multiuser operating environment.

Knowledge Booster:

- **Microsoft Word:** A word processing application, categorized as application software.
- **Photoshop:** A graphic design tool, also application software.
- **VLC Media Player:** A media player used for playing audio and video files, part of application software.
- **Chrome:** A web browser, which is also considered application software.

S70. Ans.(c)

Sol. The **SATA (Serial Advanced Technology Attachment)** port is the most commonly used port to connect an internal hard disk drive (HDD) to a motherboard. SATA is a widely adopted interface that allows for fast data transfer between the motherboard and storage devices, such as HDDs and SSDs.

Important Key Points:

1. **SATA** is the standard interface for connecting internal storage devices to the motherboard, known for high data transfer speeds.
2. It replaced older technologies like IDE (Integrated Drive Electronics) due to its improved performance and ease of use.

Knowledge Booster:

- **USB:** Commonly used for external storage devices, but not for internal HDD connections.
- **HDMI:** Used for transmitting video and audio signals, not for connecting storage devices.
- **Ethernet:** Used for networking, unrelated to HDD connections.
- **VGA:** A video graphics port for connecting monitors, not for storage devices.

S71. Ans.(b)

Sol. A **Worm** is a type of malware that can spread across networks without needing to attach itself to a host file or program. Worms propagate by exploiting vulnerabilities in systems and can cause widespread damage by consuming bandwidth, disrupting network services, and sometimes corrupting data.

Important Key Points:

1. **Worms** spread autonomously over networks and do not require user action or attachment to files, unlike viruses.
2. They often exploit network vulnerabilities, causing system slowdowns or network congestion.

Knowledge Booster:

- **Virus:** A virus typically attaches itself to a host file and requires user action to spread.
- **Trojan:** A Trojan disguises itself as legitimate software but does not spread like a worm.
- **Spyware:** Used to monitor user activity but does not spread autonomously.
- **Adware:** Displays unwanted ads but does not replicate or spread across networks like worms.

S72. Ans.(a)

Sol. A **phishing attack** is a cyber-attack where attackers send fraudulent emails, pretending to be legitimate entities, to trick individuals into revealing sensitive information like passwords, credit card numbers, or other personal data. These emails often direct users to fake websites that closely mimic genuine ones, where they are prompted to enter their confidential information.

Important Key Points:

1. **Phishing attacks** are one of the most common types of social engineering attacks used to steal personal and financial information.
2. They often use emails or messages that appear to be from trusted sources, tricking users into clicking malicious links or entering personal information.

Knowledge Booster:

- **Blocking websites:** Phishing attacks don't involve blocking websites; they use fake websites to steal data.
- **Encrypting data:** Encryption is a security method, not related to phishing.
- **Malware:** Phishing attacks don't directly involve infecting systems with malware, though they can lead to it.
- **Scanning networks:** Network scanning for vulnerabilities is a different kind of security assessment and not related to phishing.

S73. Ans.(a)

Sol. Parents can monitor the content their children are accessing online by reviewing **Activity Logs**. These logs provide detailed records of websites visited, applications used, and online activities. Many internet routers, parental control software, and devices include features that allow parents to track and control what content their children can access.

Important Key Points:

1. **Activity Logs** provide a record of a child's browsing history, which helps parents monitor online behavior.
2. Parental control software often includes activity logs to offer additional tools for monitoring and filtering inappropriate content.

Knowledge Booster:

- **Antivirus Software:** Protects devices from malware but does not provide tools for monitoring children's online activities.
- **Disabling Internet Access:** While this prevents access entirely, it doesn't allow monitoring or filtering content.
- **Installing External Storage:** External storage does not offer any features for monitoring internet activity.
- **Using Word Processors:** Word processing software is unrelated to monitoring internet activities.

S74. Ans.(b)

Sol. The main difference between **IMAP (Internet Message Access Protocol)** and **POP3 (Post Office Protocol 3)** is that **IMAP** allows email synchronization across multiple devices, meaning changes (such as reading, deleting, or moving an email) are reflected on all devices accessing the email account. **POP3**, however, downloads emails to a single device and typically removes them from the server, meaning emails are only available on the device where they were downloaded.

Important Key Points:

1. **IMAP** is ideal for accessing emails from **multiple devices** like phones, laptops, or desktops, ensuring that all changes are synced across these devices.
2. **POP3** is better for users who want to store emails on a **single device** (like **Mozilla Thunderbird** or another email client), as it downloads emails locally and often removes them from the server, making the emails available only on that device.

Knowledge Booster:

- **IMAP** stores emails on the server, allowing users to access and sync their emails across multiple devices.
- **POP3** downloads emails to a single device and typically removes them from the server after download, limiting access to one device.

S75. Ans.(b)

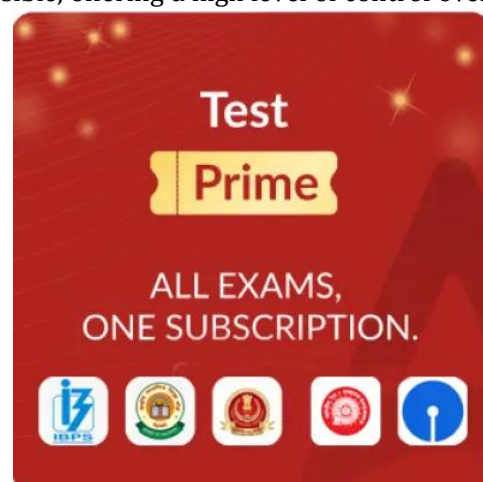
Sol. **Whitelisting** in parental lock settings refers to the process of **allowing only approved websites or content** to be accessed. In this system, parents or administrators create a list of safe or appropriate websites, and the user is restricted to accessing only those websites. Any content not on the whitelist is blocked.

Important Key Points:

1. **Whitelisting** ensures that only pre-approved websites or content are accessible, offering a high level of control over what children can view.
2. It is an effective way for parents to filter and control the content their children can access online, especially in restrictive environments.

Knowledge Booster:

- **Blocking specific websites:** This is called **blacklisting**, where certain sites are blocked, but all others are accessible.
- **Monitoring all online activities:** Involves tracking web usage but does not prevent access to certain content like whitelisting.
- **Disabling internet access:** Prevents all online access, not just content filtering.
- **Tracking time spent online:** Helps monitor usage time but does not control content access.



S76. Ans.(c)

Sol. An **SSD (Solid State Drive)** is a type of **non-volatile memory**, meaning it retains data even when the computer is powered off. Non-volatile memory, such as SSDs, is used for long-term data storage. Unlike volatile memory (e.g., RAM), non-volatile memory doesn't lose data when power is removed.

Important Key Points:

1. **Non-volatile memory** retains data without power, making it ideal for long-term storage solutions like SSDs and hard drives.
2. **Volatile memory**, such as RAM and cache, loses all stored data when the power is turned off.

Knowledge Booster:

- **RAM:** A volatile memory used for temporary storage while the computer is running.
- **Cache:** Another form of volatile memory used to store frequently accessed data for quick access.
- **Registers:** Small, fast storage locations inside the CPU, also volatile.
- **CPU:** Central Processing Unit, not a type of memory.

S77. Ans.(b)

Sol. **Laser** technology is used in optical disks (such as CDs, DVDs, and Blu-ray discs) to store and retrieve data. Data is written on the disk by burning tiny pits into the surface of the disk using a laser. The laser is also used to read the data by detecting the reflections from these pits.

Important Key Points:

1. **Optical disks** store data by using a laser to burn pits into the surface, representing binary data (0s and 1s).
2. When reading data, the laser shines onto the disk, and the reflected light is interpreted to retrieve the stored information.

Knowledge Booster:

- **Magnetic Field:** Used in magnetic storage devices such as hard drives and magnetic tapes, not in optical disks.
- **Electrical Charge:** This is used in flash storage devices, not in optical disks.
- **Capacitive Touch:** Related to touchscreens, not optical storage.
- **UV Rays:** Not used in the technology for optical disk storage.

S78. Ans.(c)

Sol. A **macro** in MS Excel is a feature that allows users to **automate repetitive tasks** by recording a sequence of actions and replaying them whenever needed. Macros are particularly useful for performing repetitive tasks such as formatting, calculations, or data entry, and they can be triggered with a single command or keyboard shortcut.

Important Key Points:

1. **Macros** help save time by automating a series of steps in Excel, reducing the need to manually repeat the same actions.
2. Users can record macros and assign them to a button or a keyboard shortcut for easy execution.

Knowledge Booster:

- **Built-in formula:** Excel uses functions like SUM() or AVERAGE(), but macros go beyond these by recording complex sequences of actions.
- **Chart creation:** Charts in Excel are created using a different process, but a macro could be used to automate the chart creation.
- **Formatting tool:** Macros can be used to automate formatting, but they are not specifically a formatting tool.
- **Sorting data:** Sorting is done using Excel's built-in tools, though macros can automate this process.

S79. Ans.(b)

Sol. **Virtual Reality (VR)**, **Augmented Reality (AR)**, and **Artificial Intelligence (AI)** enhance human understanding by creating **immersive environments** and **intelligent systems** that help people **visualize** and **process** complex information. VR provides users with a fully immersive experience, while AR overlays digital information onto the real world. AI helps in making sense of large datasets, providing insights, predictions, and recommendations that assist in decision-making.

Important Key Points:

1. **Virtual Reality (VR)** offers immersive, simulated environments that can enhance learning and understanding by placing users in lifelike scenarios.
2. **Augmented Reality (AR)** enhances real-world environments by overlaying digital information, allowing users to interact with both real and virtual elements.
3. **Artificial Intelligence (AI)** processes data, generates insights, and provides intelligent systems that help humans understand complex concepts more effectively.

Knowledge Booster:

- **AI** is extensively used in educational tools, simulations, and decision-making systems, providing insights that help in various fields like medicine, engineering, and business.
- **VR and AR** are applied in sectors like education, healthcare, and entertainment to improve understanding through immersive and interactive learning experiences.

S80. Ans.(b)

Sol. In **Quantum Computing**, the basic unit of information is a **qubit**, which differs from traditional bits used in classical computing. Qubits can exist in multiple states simultaneously due to quantum superposition, enabling quantum computers to process information much more efficiently than classical computers, which use bits that can only be in one state (0 or 1) at a time.

Important Key Points:

1. **Qubits** can represent both 0 and 1 simultaneously due to quantum superposition, allowing for parallel processing.
2. **Quantum Computing** is especially useful for solving complex problems like cryptography, material simulations, and optimization tasks that are challenging for classical computers.

Knowledge Booster:

- **Classical Bits:** Used in traditional computers, where a bit can be either 0 or 1, unlike qubits which can represent multiple states.
- **Registers:** Temporary storage in classical CPUs, not used in quantum computing.
- **Cache:** A small, fast memory in classical computing, unrelated to quantum processing.
- **Transistors:** The building blocks of classical computer processors, not relevant in quantum computing.

S81. Ans.(c)

Sol. The **\$500 million loan** provided by the **International Finance Corporation (IFC)** to **HDFC Bank** is primarily aimed at providing **microloans to self-help groups (SHGs)**.

These loans are part of **HDFC Bank's Sustainable Livelihoods Initiative (SLI)**, which focuses on empowering underserved women in rural and semi-urban areas.

The initiative helps **SHGs and joint liability groups (JLGs)** access financial resources, promoting entrepreneurship and financial inclusion, particularly among women who have limited access to formal banking systems.

This facility boosts efforts to support rural livelihoods and drive economic development.

Static facts of HDFC Bank:

- **Full Name:** Housing Development Finance Corporation Bank
- **Founded:** August 1994
- **Headquarters:** Mumbai, Maharashtra
- **Founder:** Hasmukhbhai Parekh
- **Tagline:** *We understand your world*
- **Parent Company:** HDFC Ltd. (before merger with HDFC Bank in 2023)
- **Type:** Private Sector Bank
- **Regulator:** Reserve Bank of India (RBI)

S82. Ans.(d)

Sol. In **TIME magazine's 2024 list of the world's most influential companies**, **Reliance Industries Limited (RIL)** and the **Tata Group** have both been placed in the **Titans** category.

This annual list highlights companies making a significant impact globally, and both Reliance and Tata have been recognized for their large-scale influence and leadership in various sectors.

Meanwhile, the **Serum Institute of India** has been categorized under **Pioneers** for its innovative contributions to the healthcare industry.

S83. Ans.(b)

Sol. In May 2024, **Airbus Helicopters** signed an MoU with the **Small Industries Development Bank of India (SIDBI)** to provide financing solutions for civil helicopter operators in India interested in purchasing Airbus helicopters. While Airbus will offer its industry knowledge and technical expertise, **SIDBI** will be responsible for evaluating potential operators and financing them exclusively for the purchase of Airbus helicopters.

Small Industries Development Bank of India Static Facts:

- The Small Industries Development Bank of India (SIDBI) is the **apex regulatory body for the overall licensing and regulation of micro, small and medium enterprise** finance companies in India.
- **Established:** 2nd April 1990
- **Headquarters:** Lucknow, Uttar Pradesh

S84. Ans.(a)

Sol. The **UDGAM** portal, which stands for **Unclaimed Deposits-Gateway to Access inforMation**, is developed by the **Reserve Bank of India (RBI)** to help registered users search for **unclaimed deposits or accounts** across multiple banks in a centralized manner.

This portal simplifies the process of tracking unclaimed funds, which were previously scattered across different banks, ensuring easier access for the account holders or their heirs.

All unclaimed deposits/accounts that are part of Depositor Education and Awareness (DEA) Fund of RBI can be searched in UDGAM portal.

S85. Ans.(d)

Sol. **Peru** is the **first South American country** to adopt a UPI-like instant payments system, following an agreement between **NPCI International Payments Limited (NIPL)**, the international arm of the **National Payments Corporation of India (NPCI)**, and the central bank of Peru.

This partnership aims to develop instant payment technology similar to UPI for Peru, enhancing its digital payments infrastructure.

NIPL had previously entered into a similar agreement with the **Bank of Namibia** earlier in 2024.

Static facts about Peru:

- **Capital:** Lima
- **Currency:** Peruvian Sol (PEN)
- **Official Language:** Spanish (with Quechua and Aymara also recognized in specific regions)
- **Continent:** South America

S86. Ans.(d)

Sol. **NATO** is celebrating **75 years** of collective defense in **2024**.

Since its creation, the Alliance has expanded from 12 founding members to 32 countries, all working together to ensure the safety and security of their populations through mutual cooperation and defense strategies.

North Atlantic Treaty Organisation (NATO) static facts:

- The North Atlantic Treaty Organization, also called the North Atlantic Alliance, is an intergovernmental military alliance between 31 member states – 29 European and two North American.
- **Formation:** 1949
- **Headquarters:** Brussels, Belgium

S87. Ans.(c)

Sol. **World Bee Day** is celebrated annually on **May 20**. The day aims to raise awareness about the crucial role bees play in pollination, biodiversity, and food security, while also highlighting the need to protect these vital pollinators from threats like habitat loss and climate change.

S88. Ans.(a)

Sol. A savings or current account is treated as **inoperative/dormant** if there are no transactions in the account for over a period of **24 months** (i.e., two years). Such accounts are segregated and maintained separately to ensure proper management and prevent any unauthorized activity.

S89. Ans.(e)

Sol. The Reserve Bank of India (RBI) issued guidelines in **April 2024** for the voluntary conversion of **Small Finance Banks (SFBs)** into **universal banks**.

Detailed Overview of Guidelines:

- This transition is based on the **2019 "on-tap" licensing guidelines**, requiring the SFBs to meet the minimum paid-up capital or net worth requirements for universal banks, maintain a satisfactory performance for a minimum of five years, and pass the RBI's due diligence exercise.
- To be eligible for conversion into a universal bank, the RBI stipulates that only listed SFBs will qualify.
- Those intending to convert must have a minimum net worth of Rs 1,000 crore.
- Also, the SFBs must have a scheduled status and a satisfactory track record of at least five years with a gross non-performing asset (NPA) of 3 per cent or less and a net NPA of 1 per cent or less in the past two financial years.

S90. Ans.(d)

Sol. In the QS World University Rankings 2025, both the **University of Delhi** (ranked 328) and **Anna University** (ranked 383) were included among the top 11 institutes from India, apart from the IITs and IISc.

In the **2025 QS World University Rankings**, **Indian Institute of Technology Bombay (IIT-B)** has achieved a global rank of **118**, a substantial improvement from its rank of **149** in 2024.

This marks a rise of **31 positions**, demonstrating the institute's progress in various parameters like academic reputation, employer reputation, faculty-student ratio, and research impact.

IIT Bombay's consistent focus on innovation, research, and quality education has helped it strengthen its global standing. The rankings also show an overall improvement for many Indian universities, with **61%** of them advancing in position.

S91. Ans.(e)

Sol. The five newly elected non-permanent members of the **United Nations Security Council (UNSC)** for the term from **January 1, 2025, to December 31, 2026**, are **Denmark, Greece, Panama, Pakistan, and Somalia**. **Uruguay** was not among the countries elected in this term.

The non-permanent members serve two-year terms and contribute to decisions regarding international peace and security.

S92. Ans.(c)

Sol. Statement 1 is correct: AIFs are privately pooled investment vehicles for sophisticated investors, whether Indian or foreign.

Statement 2 is incorrect: VCFs registered under the SEBI (Venture Capital Funds) Regulations, 1996 cannot launch new schemes under these regulations, as they were repealed.

Statement 3 is correct: Existing VCFs can seek re-registration under the **SEBI (Alternative Investment Funds) Regulations, 2012**, subject to the approval of two-thirds of their investors by value.

S93. Ans.(c)

Sol. The **Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA)** provides a minimum of **100 days** of guaranteed wage employment in a financial year to rural households.

The scheme aims to enhance livelihood security by offering employment to adult members of rural households who volunteer to do unskilled manual work, targeting vulnerable sections like Scheduled Castes, Scheduled Tribes, and women-headed households.

S94. Ans.(d)

Sol. The **Saksham App** launched by the **Election Commission** allows easier voting access for Persons with Disabilities. Additionally, voters above **85 years of age** are eligible to vote from home.

This initiative ensures that elderly voters and those with disabilities can conveniently cast their votes, in line with the Election Commission's motto of leaving no voter behind.

Static facts about the Election Commission of India:

Key Facts:

1. **Establishment:** The Election Commission of India (ECI) was established on **January 25, 1950**.
2. **Constitutional Authority:** It is a permanent and independent body established under **Article 324** of the **Indian Constitution** to supervise elections in India.
3. **Composition:**
 - Initially, the Election Commission was a single-member body. However, in **1993**, it became a multi-member body with **one Chief Election Commissioner (CEC)** and **two Election Commissioners (ECs)**.
 - The **President of India** appoints the CEC and ECs.

Key Initiatives:

- **Electronic Voting Machines (EVMs):** Introduced by the Election Commission to make the election process faster, more accurate, and tamper-proof.
- **Voter Verifiable Paper Audit Trail (VVPAT):** Implemented to provide a verifiable trail of votes cast using EVMs.
- **Saksham App:** Launched to make voting easier for Persons with Disabilities (PwDs).

S95. Ans.(d)

Sol. Under the **Namo Drone Didi Scheme**, the Government of India provides a subsidy of **80%** of the total amount for drones or up to a maximum of **INR 8 lakh**. This initiative aims to expose self-help group members to the latest drone technology, promoting technological advancement and economic empowerment.

S96. Ans.(c)

Sol. **Jeff Bezos**, the founder of Amazon, is also the founder of **Blue Origin**, which is responsible for taking Gopi Thotakura to space on the **NS-25 mission**. Blue Origin is known for its advancements in space tourism and reusable rocket technology, aiming to make space travel more accessible.

S97. Ans.(c)

Sol. The **C-Dome** is the **naval version** of Israel's **Iron Dome** air defense system, designed to protect ships against rocket and missile attacks. It was deployed for the first time near Eilat to neutralize a suspicious target that entered Israeli airspace.

Static facts of Israel:

1. **Capital: Jerusalem** (Though some countries maintain embassies in **Tel Aviv** due to political sensitivities)
2. **Official Languages: Hebrew** (primary), **Arabic** (secondary, especially used in certain regions)
3. **Currency: Israeli New Shekel (ILS)**
4. **Independence Day: May 14, 1948** (recognized as the day Israel declared independence)

S98. Ans.(d)

Sol. Peter Higgs predicted the existence of the **God particle**, formally known as the **Higgs boson**, in **1964**. This particle explains how other subatomic particles gain mass, which is fundamental to the formation of matter in the universe. The particle was experimentally confirmed in **2012** at CERN's Large Hadron Collider.

S99. Ans.(a)

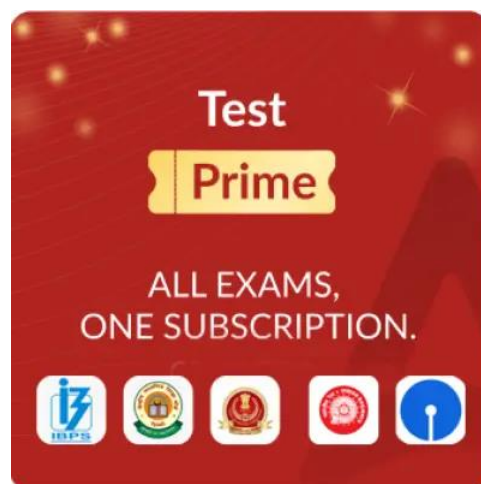
Sol. On **June 7, 2024**, the **Reserve Bank of India (RBI)** revised the definition of **bulk deposits** for **scheduled commercial banks** and **small finance banks (SFBs)**. The new limit for bulk deposits is now set at **Rs 3 crore and above**. This is an increase from the previous threshold of Rs 2 crore. Bulk deposits refer to large, single-rupee term deposits made with banks, which often attract higher interest rates due to their size. This change was announced by RBI Governor **Shaktikanta Das** during the **Monetary Policy Committee (MPC)** meeting, aimed at aligning deposit practices with current market conditions. It is important to note that **regional rural banks (RRBs)** are excluded from this revised limit.

S100. Ans.(b)

Sol. A **surety bond** is issued by an **insurance company** on behalf of a contractor or business owner.

It serves as a guarantee to the entity awarding the project (the **obligee**) that the contractor will fulfill their obligations.

If the contractor fails to complete the work as promised, the insurance company compensates the obligee.



S101. Ans.(e)

Sol. **Mission Karmayogi** aims to create a competent civil service that is aligned with Indian values and priorities, ensuring effective and efficient public service delivery.

The mission focuses on empowering civil servants to adapt and deliver in challenging environments while keeping them at the center of all transformative changes.

S102. Ans.(b)

Sol. The **Raisina Dialogue** is India's flagship conference on geopolitics and geo-economics.

The **9th edition** was inaugurated by Prime Minister Shri **Narendra Modi** on **February 21, 2024**, with **H.E. Mr. Kyriakos Mitsotakis**, the Prime Minister of Greece, as the Chief Guest.

The event focuses on addressing global challenges and fostering international cooperation.

S103. Ans.(c)

Sol. **South Africa** will host the **G20 summit** in **2025**.

The G20 presidency rotates annually among its members, with **Brazil** hosting in **2024** and the **United States** hosting in **2026**.

The G20 summits focus on international economic cooperation and addressing global challenges.

G20 (Group of 20):

- The G20 or Group of 20 is an intergovernmental forum comprising **19 countries and the European Union**.
- It works to address major issues related to the global economy, such as international financial stability, climate change mitigation, and sustainable development.
- **Founded:** 1999
- **Members:** *Argentina, Australia, Brazil, Canada, China, France, Germany, India, Indonesia, Italy, Japan, Mexico, Republic of Korea, Russia, Saudi Arabia, South Africa, Turkey, United Kingdom, United States of America, European Union*

S104. Ans.(a)

Sol. The **Swamitva Scheme** primarily aims to provide **Record of Rights** to the rural and tribal populations by mapping and documenting land parcels.

This initiative will help in resolving property disputes and ensuring land ownership, thus empowering tribal communities and improving their socio-economic status.

S105. Ans.(b)

Sol. **Meta Platforms, Inc.** owns **Facebook, Instagram, WhatsApp, and Threads**.

Meta, formerly known as Facebook, acquired these social media platforms to expand its presence in the digital communications and social networking space.

S106. Ans.(a)

Sol. The **Prime Minister of India** serves as the **President of the Council of Scientific & Industrial Research (CSIR)**.

CSIR is a leading R&D organization in India with a broad network of national laboratories and outreach centers, contributing significantly to various fields of science and technology.

S107. Ans.(b)

Sol. **Kannauj**, a small city in Uttar Pradesh, is renowned as the "**Perfume Capital of India**" for its centuries-old tradition of producing high-quality fragrances and essential oils, particularly using natural ingredients.

The city is famous for its traditional **attars** (perfumes) and has a rich history in the perfume industry.

S108. Ans.(d)

Sol. On the **TReDS** platform, only **Micro, Small, and Medium Enterprises (MSMEs)** can participate as **sellers**.

TReDS is designed to facilitate the financing or discounting of MSME trade receivables through multiple financiers. Corporates, Government Departments, and PSUs can participate as **buyers** on the platform.

S109. Ans.(c)

Sol. As of March 31, 2024, the **private sector banks** assigned **Lead Bank responsibility** are **Jammu & Kashmir Bank** and **ICICI Bank** under the Lead Bank Scheme, along with 12 public sector banks, covering 779 districts in the country.

S110. Ans.(d)

Sol. Paradip Port in Odisha became India's largest major port by handling **145.38 million tonnes** of cargo in FY24, surpassing **Deendayal Port Authority** in Gujarat for the first time in its **56-year history**. Paradip Port plays a crucial role in handling bulk cargo, especially coal and iron ore.

S111. Ans.(c)

Sol. The **Economic Survey 2023-24** states that the Indian economy needs to generate an average of **78.5 lakh jobs annually** in the **non-farm sector** until 2030 to meet the employment demands of the growing workforce.

S112. Ans.(d)

Sol. Siri is the virtual assistant developed by **Apple**. It is integrated into various Apple devices, including iPhones, iPads, and Macs, providing voice-activated assistance for tasks like setting reminders, sending messages, and searching the web.

S113. Ans.(a)

Sol. CVV (Card Verification Value) is related to **banking** but not directly linked to loans. It is a security feature used with credit and debit cards for online transactions. The other options are loan-related:

- **LTV** (Loan-to-Value)
- **EMI** (Equated Monthly Installment)
- **KCC** (Kisan Credit Card)

S114. Ans.(d)

Sol. The IUCN has listed mangroves in the coastal regions of **Tamil Nadu**, alongside **Sri Lanka** and **Maldives**, as 'critically endangered' in its first global assessment of mangrove ecosystems. Tamil Nadu has taken measures to protect its mangrove cover in response to this classification.

Static Facts of International Union for Conservation of Nature (IUCN):

- **Founded:** 1948
- **Headquarters:** Gland, Switzerland
- **Mission:** To influence, encourage, and assist societies throughout the world to conserve the integrity and diversity of nature and to ensure that any use of natural resources is equitable and ecologically sustainable.

S115. Ans.(b)

Sol. The **National Commission on Farmers**, which made key recommendations regarding agricultural policies, including the **Minimum Support Price (MSP)**, was headed by **Dr. M. S. Swaminathan**. He is known as the father of the Green Revolution in India and played a pivotal role in shaping agricultural reforms in the country.

S116. Ans.(a)

Sol. **Statement 1** is correct: The first **GI tag** in India was awarded to **Darjeeling tea** in 2004-05.

Statement 2 is correct: The **Geographical Indications of Goods (Registration and Protection) Act, 1999**, came into effect in 2003.

Statement 3 is incorrect: A geographical indication (GI) tag is valid for **10 years** and can be renewed for another **10 years**.

S117. Ans.(d)

Sol. **PSLC Education** is not a type of Priority Sector Lending Certificate (PSLC).

The four types of PSLCs are PSLC Agriculture, PSLC SF/MF (Small and Marginal Farmers), PSLC Micro Enterprises, and PSLC General, which are used by banks to meet their priority sector lending targets.

S118. Ans.(c)

Sol. The **incorrect statement** is **Statement 3**.

Statement 1:

- This is **correct**. Under the **Agriculture Infrastructure Fund**, all loans up to ₹2 crore are eligible for an **interest subvention of 3% per annum** for a **maximum period of 7 years**. This financial support is designed to encourage investment in agricultural infrastructure.

Statement 2:

- This is **correct**. The scheme covers **post-harvest management projects**, including **e-marketing platforms, warehouses, cold chains, logistics facilities**, and other infrastructure related to smart and precision agriculture, supply chains, and community farming assets.

Statement 3:

- This is **incorrect**. The **Agriculture Infrastructure Fund** is operational from **2020-21 to 2032-33**, with loan disbursement under the scheme to be completed by the end of **Financial Year 2025-26**. The statement incorrectly mentions the period as **2035-36** with loan disbursement ending in **2028-29**.

S119. Ans.(a)

Sol. The **SWAMIH Investment Fund I** is a social impact fund focused on providing **last-mile funding** for stalled and stressed residential projects in the **affordable and mid-income housing** segments.

The **Special Window for Affordable and Mid-Income Housing (SWAMIH) Investment Fund I** is a social impact fund created to resolve the issue of stalled and stressed residential projects in the affordable and mid-income housing segments. The fund is sponsored by the **Ministry of Finance, Government of India** and is managed by **SBICAP Ventures Ltd.**, a company under the **State Bank Group**.

The SWAMIH fund aims to provide last-mile funding to ensure the completion of these housing projects, which have been delayed due to financial issues. By focusing on completing such projects, the fund supports homebuyers and boosts the real estate sector.

S120. Ans.(c)

Sol. Under the **RB-IOs 2021**, the **RBI Ombudsman** can provide compensation of up to **₹1 lakh** for **mental agony or harassment** suffered by the complainant, in addition to resolving complaints where the compensation sought for direct financial loss is ₹20 lakh or lower.

Detailed Overview of RB-IOs:

1. **Objective:** Provides a single platform for addressing customer complaints related to financial services.
2. **Scope:** Covers banks, NBFCs, and payment service providers.
3. **Compensation:**
 - Financial compensation for losses up to **₹20 lakh**.
 - Up to **₹1 lakh** for **mental agony** or harassment.
4. **No Fee:** Filing complaints is free of charge.
5. **Lodging Complaints:** If the issue isn't resolved by the service provider within **30 days**, customers can approach the Ombudsman via the **RBI's Complaint Management System (CMS)**.
6. **Resolution:** The Ombudsman tries to resolve issues via conciliation; if not, an award is passed.
7. **Appeal:** Appeals can be made to the **Deputy Governor of RBI** if dissatisfied with the decision.

S121. Ans.(d)

Sol. Let's break down the paragraph sentence by sentence and identify grammatical errors.

Detailed Analysis:

1. **"Russia's geopolitical pivot too Asia, particularly in light of global shifts, marks a strategic realignment with key regional players, especially India."**
 - **Error:** "too" should be "to" because "to" is a preposition indicating direction or relation, while "too" means "also."
 - **Correction:** "Russia's geopolitical pivot *to* Asia, particularly in light of global shifts, marks a strategic realignment with key regional players, especially India."
2. **"Strengthen ties with India offers Russia opportunities for economic collaboration, technology transfer, and energy partnerships."**
 - **Error:** "Strengthen" should be "Strengthening" to match the subject-verb agreement. A gerund ("Strengthening") should be used here because it acts as the subject of the sentence.
 - **Correction:** "*Strengthening* ties with India offers Russia opportunities for economic collaboration, technology transfer, and energy partnerships."
3. **"This pivot comes as Russia seeks to diversify it's international relations amid growing tensions with the West."**

- **Error:** "it's" is incorrect because "it's" is a contraction for "it is" or "it has." The possessive form "its" should be used here to indicate possession.
- **Correction:** "This pivot comes as Russia seeks to diversify *its* international relations amid growing tensions with the West."
- 4. **"The evolving dynamics among the two nations underscore the importance of their role in shaping Asia's geopolitical landscape."**
- **Error:** "among" is incorrect because it is used for three or more entities. Since we are talking about two nations, "between" should be used instead.
- **Correction:** "The evolving dynamics *between* the two nations underscore the importance of their role in shaping Asia's geopolitical landscape."

Final Answer:

There are **four errors** in the paragraph:

1. "too" → "to"
2. "Strengthen" → "Strengthening"
3. "it's" → "its"
4. "among" → "between"

Thus, the correct answer is **(d) Four errors**.

Grammar Explanation:

- **Preposition:** "to" is a preposition indicating direction, while "too" is an adverb meaning "also" or "excessively."
- **Gerund:** The gerund form ("-ing") is needed when the verb serves as the subject of the sentence.
- **Possessive vs Contraction:** "its" is the possessive form; "it's" is a contraction for "it is" or "it has."
- **Between vs Among:** "Between" is used for two entities, while "among" is used for more than two entities.

S122. Ans.(b)

Sol. Let's analyze the paragraph sentence by sentence and identify any grammatical errors.

Detailed Analysis:

1. **"India's evolving security challenges, both internal as well as external, necessitate a comprehensive 'National Security Strategy.'"**
 - **Error:** "both internal as well as external" is redundant. The correct phrasing should be either "both internal and external" or "internal as well as external."
 - **Correction:** "India's evolving security challenges, *both internal and external*, necessitate a comprehensive 'National Security Strategy.'"
2. **"As regional dynamics shift and new threats such as cyber warfare, terrorism, and border tensions emerge, a cohesive strategy would helps streamline the country's defense, intelligence, and diplomatic efforts."**
 - **Error:** "helps" should be "help" to correctly match the modal verb "would." Modal verbs like "would" are followed by the base form of the verb.
 - **Correction:** "a cohesive strategy would *help* streamline the country's defense, intelligence, and diplomatic efforts."
3. **"This framework would guide decision-making, ensuring that national interests are protected across military, economic, and technological domains."**
 - **No error** in this sentence.
4. **"Additionally, it would enable India to proactively address security risks, enhance preparedness, and strengthen collaborations with global allies, ultimately safeguarding its sovereignty and promoting regional stability."**
 - **No error** in this sentence.

Final Answer:

There are **two errors** in the paragraph:

1. "both internal as well as external" → "both internal and external"
2. "helps" → "help"

Thus, the correct answer is **(b) Two errors**.

Grammar Explanation:

- **Redundancy:** "both internal as well as external" is redundant because "both" and "as well as" serve similar purposes in this context. It should be simplified to "both internal and external."
- **Base form of verb after modal:** After modal verbs like "would," the base form of the verb ("help") is used instead of "helps."

S123. Ans.(c)

Sol. Let's analyze the paragraph sentence by sentence and identify any grammatical errors.

Detailed Analysis:

1. **"NITI Aayog recent unveiled the 'Greening and Restoration of Wasteland with Agroforestry' (GROW) report, highlighting the potential of agroforestry to rejuvenate India's vast wastelands."**
 - **Error:** "recent" should be "recently" because the adverb "recently" modifies the verb "unveiled."
 - **Correction:** "NITI Aayog *recently* unveiled the 'Greening and Restoration of Wasteland with Agroforestry' (GROW) report, highlighting the potential of agroforestry to rejuvenate India's vast wastelands."
2. **"The report emphasizes the role of agroforestry in enhancing biodiversity, improve soil health, and supporting sustainable livelihoods for rural communities."**
 - **Error:** "improve" should be "improving" to maintain parallel structure with "enhancing" and "supporting." The list of activities should have consistent verb forms.
 - **Correction:** "The report emphasizes the role of agroforestry in enhancing biodiversity, *improving* soil health, and supporting sustainable livelihoods for rural communities."
3. **"It propose a multi-sectoral approach, involving government agencies, private sector, and local communities, to transform barren lands into productive ecosystems."**
 - **Error:** "propose" should be "proposes" because the subject "It" is singular and requires the third-person singular verb form.
 - **Correction:** "It *proposes* a multi-sectoral approach, involving government agencies, private sector, and local communities, to transform barren lands into productive ecosystems."
4. **"The GROW initiative is part of India's broader strategy to combat climate change, increase carbon sequestration, and meet its land restoration commitments under international environmental agreements."**
 - **No error** in this sentence.

Final Answer:

There are **three errors** in the paragraph:

1. "recent" → "recently"
2. "improve" → "improving"
3. "propose" → "proposes"

Thus, the correct answer is **(c) Three errors.**

Grammar Explanation:

- **Adverb vs Adjective:** "recently" is the correct adverb form to modify the verb "unveiled."
- **Parallel structure:** In a list of actions, all verbs should have the same form. Here, "improving" needs to match "enhancing" and "supporting."
- **Subject-verb agreement:** The singular subject "It" requires the singular verb "proposes," not the plural "propose."

S124. Ans.(a)

Sol. Let's analyze the paragraph sentence by sentence and identify any grammatical errors.

Detailed Analysis:

1. **"Learning languages offers numerous cognitive, cultural, and social benefits, making it a vital skill in today's interconnected world."**
 - **No error** in this sentence.
2. **"It enhances problem-solving abilities, improves memory, and boosts multitasking skills by engaging different parts of the brain."**
 - **No error** in this sentence.
3. **"Beyond cognitive development, mastering a new language fosters cross-cultural understanding, promoting global cooperation and empathy."**
 - **No error** in this sentence.
4. **"In professional settings, language proficiency opens doors to new markets, enhances communication, and provides a competitive edge."**
 - **No error** in this sentence.
5. **"Ultimate, learning languages broadens perspectives, empowering individuals to connect with diverse communities and navigate the global landscape more effectively."**
 - **Error:** "Ultimate" should be "Ultimately" because an adverb is needed to modify the whole sentence, not the adjective "ultimate."

- **Correction:** "Ultimately, learning languages broadens perspectives, empowering individuals to connect with diverse communities and navigate the global landscape more effectively."

Final Answer:

There is **only one error** in the paragraph:

1. "Ultimate" → "Ultimately"

Thus, the correct answer is **(a) Only one error.**

Grammar Explanation:

- **Adverb vs Adjective:** "Ultimately" is the correct adverb form to modify the entire sentence. The adjective "ultimate" is incorrect in this context because it refers to something being the final or most important, while "ultimately" means "in the end" or "finally," which fits the intended meaning here.

S125. Ans.(b)

Sol. The correct answer is **option (b) EDBCA** because this sequence arranges the sentence in a coherent and grammatically correct way. Here's the explanation:

- **Part (E):** "financial institutions are" starts the sentence by introducing the subject (financial institutions).
- **Part (D):** "ramping up their digital" follows logically, explaining what the institutions are doing—improving their digital processes.
- **Part (B):** "onboarding processes, simplifying" continues by specifying that they are focusing on onboarding processes and simplifying them.
- **Part (C):** "the loan application and" follows logically, indicating that the simplification applies to the loan application process.
- **Part (A):** "approval journey for customers" completes the sentence by explaining that the goal is to streamline the approval process for customers.

The rearranged sentence is: **"Financial institutions are ramping up their digital onboarding processes, simplifying the loan application and approval journey for customers."**

This makes **option (b) EDBCA** the correct answer.

S126. Ans.(d)

Sol. The correct answer is **option (d) ACBED** because this sequence arranges the sentence in a grammatically correct and coherent way. Here's the explanation:

- **Part (A):** "International Self-Care Day is" introduces the subject of the sentence, which is International Self-Care Day.
- **Part (C):** "celebrated on the 24th of" continues by specifying when this day is observed.
- **Part (B):** "July each year to emphasize" completes the date and introduces the purpose of the celebration.
- **Part (E):** "the importance of" follows logically, explaining what is emphasized—importance.
- **Part (D):** "self-care and self-love" completes the sentence by specifying what is considered important.

The rearranged sentence is: **"International Self-Care Day is celebrated on the 24th of July each year to emphasize the importance of self-care and self-love."**

This makes **option (d) ACBED** the correct answer.

S127. Ans.(a)

Sol. The correct answer is **option (a) CDBEA** because this sequence arranges the sentence in a grammatically correct and meaningful way. Here's the explanation:

- **Part (C):** "'parenting parents' refers to" starts the sentence by introducing the term "parenting parents" and stating that it refers to something.
- **Part (D):** "adult children taking on the" continues by explaining that it refers to adult children assuming a specific responsibility.
- **Part (B):** "role of caregivers for their" specifies the role these adult children take on, which is caregiving.
- **Part (E):** "aging parents, providing" continues by specifying who they are providing care for—their aging parents.
- **Part (A):** "support and guidance as needed" completes the sentence by explaining the type of care provided, which includes support and guidance.

The rearranged sentence is: **"'Parenting parents' refers to adult children taking on the role of caregivers for their aging parents, providing support and guidance as needed."**

This makes **option (a) CDBEA** the correct answer.

S128. Ans.(c)

Sol. The correct answer is **option (c) DEABC** because this sequence arranges the sentence in a logical and grammatically correct way. Here's the explanation:

- **Part (D):** "'Doctors and handwriting' often refers to" starts the sentence by introducing the subject, which is the stereotype about doctors' handwriting.
- **Part (E):** "the stereotype that doctors have illegible" follows naturally, explaining what the stereotype is—that doctors are known for illegible handwriting.
- **Part (A):** "handwriting, particularly in prescriptions and" continues by specifying where this illegible handwriting is most commonly seen—in prescriptions and medical notes.
- **Part (B):** "medical notes, which can sometimes lead to" adds more detail, explaining that this illegibility can lead to certain problems.
- **Part (C):** "misunderstandings or errors in patient care" completes the sentence by describing the potential consequences of illegible handwriting.

The rearranged sentence is: **"Doctors and handwriting' often refers to the stereotype that doctors have illegible handwriting, particularly in prescriptions and medical notes, which can sometimes lead to misunderstandings or errors in patient care."**

This makes **option (c) DEABC** the correct answer.

S129. Ans.(a)

Sol. The most appropriate connector to combine the sentences into a coherent and grammatically correct sentence is "and."

Explanation:

- "And" connects two actions that are sequentially related in the sentence: first, the manager reviewed the proposal, and then she approved it after discussing some minor modifications.
- "In addition to" and "likewise" are not suitable as they suggest an additive or comparative relationship, which is not the intended context here.

Thus, the correct answer is:

(a) only (i)

The sentence would read:

The manager reviewed the proposal, **and** she approved it after discussing some minor modifications.

Summary:

- **and** adds two related actions, making it the correct connector.
- **in addition to** adds separate points, which doesn't apply.
- **likewise** compares similar actions, but these actions aren't comparable, they're sequential.

S130. Ans.(e)

Sol. Let's analyze each option for blank (A) in the sentence:

"The discovery of cells marked a monumental (A) point in biological science."

(a) Showing

- **Meaning in English:** Indicating, revealing, or making something visible.
- **Meaning in Hindi:** दिखाना या प्रकट करना।
- **Correct or Incorrect: Incorrect.** While "showing" conveys the idea of revealing or indicating, it does not fit the phrase "___ point" as well as "turning point" would in the context of a significant discovery.

(b) Looping

- **Meaning in English:** Moving in a circular path or repeating something.
- **Meaning in Hindi:** घुमाव या बार-बार दोहराने वाली प्रक्रिया।
- **Correct or Incorrect: Incorrect.** "Looping" refers to a repetitive or circular process and does not logically fit the context of a significant breakthrough in science, which is meant to represent a turning point rather than repetition.

(c) Dialing

- **Meaning in English:** Adjusting or tuning something (e.g., on a dial); making a phone call.
- **Meaning in Hindi:** डायल करना या समायोजित करना।
- **Correct or Incorrect: Incorrect.** "Dialing" does not fit the context of a breakthrough or significant change in science. It is too literal and specific to actions like tuning or making phone calls.

(d) Blowing

- **Meaning in English:** Expelling air forcefully, or causing to explode or spread.
- **Meaning in Hindi:** उड़ाना या फूँक मारना।
- **Correct or Incorrect:** **Incorrect.** "Blowing" doesn't fit the context either, as it usually refers to wind, air, or explosions, which are irrelevant to the scientific discovery mentioned here.

(e) Turning

- **Meaning in English:** A significant change in direction, or the point at which such a change occurs.
- **Meaning in Hindi:** मोड़ या दिशा बदलने का बिंदु।
- **Correct or Incorrect:** **Correct.** "Turning point" is the most appropriate phrase here, as it refers to a moment when a significant change or advancement occurs, which aligns with the discovery of cells being a crucial advancement in biological science.

Final Answer:

The most appropriate word for blank (A) is **(e) turning**.

S131. Ans.(c)

Sol. Let's analyze the options for blank (B) in the sentence:

"In 1665, Robert Hooke first identified cells while observing cork tissue **(B)** a microscope..."

(a) Over

- **Meaning in English:** Positioned higher than something, usually with no contact.
- **Meaning in Hindi:** ऊपर, बिना किसी संपर्क के।
- **Correct or Incorrect:** **Incorrect.** "Over" suggests a position above something, but without physical connection, which doesn't fit the context of observing through a microscope.

(b) Above

- **Meaning in English:** Higher in position, but not in direct contact.
- **Meaning in Hindi:** ऊपर, बिना संपर्क के।
- **Correct or Incorrect:** **Incorrect.** Similar to "over," "above" implies a location higher than something but not touching or interacting with it. It does not work with the idea of using a microscope to observe cells.

(c) Under

- **Meaning in English:** Below or beneath something.
- **Meaning in Hindi:** नीचे या किसी वस्तु के तले।
- **Correct or Incorrect:** **Correct.** "Under" is appropriate because cells are observed under a microscope, meaning the tissue is placed beneath the microscope for examination.

(d) Below

- **Meaning in English:** Lower than something else in position, but not necessarily directly under.
- **Meaning in Hindi:** नीचे, लेकिन सीधे संपर्क में नहीं।
- **Correct or Incorrect:** **Incorrect.** "Below" does not fit well here, as it generally refers to a relative position, rather than the specific action of using a microscope for observation.

(e) Around

- **Meaning in English:** Surrounding something.
- **Meaning in Hindi:** चारों ओर।
- **Correct or Incorrect:** **Incorrect.** "Around" doesn't work in this context, as it suggests surrounding something, which doesn't apply to using a microscope to observe cells.

Final Answer:

The most appropriate word for blank (B) is **(c) under**.

S132. Ans.(a)

Sol. Let's analyze the options for blank (C) in the sentence:

"This revelation led to the development of cell theory, which **(C)** that all living organisms are composed of cells, the basic unit of life."

(a) Postulates

- **Meaning in English:** Suggests or assumes the truth of something as the basis for reasoning, discussion, or belief.
- **Meaning in Hindi:** सिद्धांत रूप में मान लेना या प्रस्तावित करना।
- **Correct or Incorrect:** **Correct.** "Postulates" fits the context of a scientific theory that assumes or suggests that all living organisms are made up of cells, which is a foundational concept in biology.

(b) Activities

- **Meaning in English:** Actions or tasks that are done or performed.
- **Meaning in Hindi:** गतिविधियाँ।
- **Correct or Incorrect: Incorrect.** "Activities" is not suitable here as it refers to actions or tasks, which does not fit the description of a theory stating a foundational biological principle.

(c) Affiliates

- **Meaning in English:** Officially connects or associates with something.
- **Meaning in Hindi:** संबद्ध करना या जोड़ना।
- **Correct or Incorrect: Incorrect.** "Affiliates" means to associate or connect, which does not fit in this scientific context where a principle or assumption is being stated by a theory.

(d) Calculates

- **Meaning in English:** Determines something mathematically.
- **Meaning in Hindi:** गणना करना।
- **Correct or Incorrect: Incorrect.** "Calculates" does not fit here, as the theory is not about performing calculations but rather stating an important biological principle.

(e) Regulates

- **Meaning in English:** Controls or maintains the rate or speed of a process.
- **Meaning in Hindi:** नियंत्रित करना।
- **Correct or Incorrect: Incorrect.** "Regulates" would imply control, which doesn't apply to what the cell theory is proposing.

Final Answer:

The most appropriate word for blank (C) is **(a) postulates**.

S133. Ans.(c)

Sol. Let's analyze the options for blank (D) in the sentence:

"Scientific research **(D)** rapidly, with the discovery of various cell structures and functions, including the nucleus, mitochondria, and DNA."

(a) Plugged

- **Meaning in English:** Filled or blocked an opening or hole.
- **Meaning in Hindi:** भरना या रोकना।
- **Correct or Incorrect: Incorrect.** "Plugged" is used for filling or blocking something, which does not fit the context of research progressing or moving forward.

(b) Furnished

- **Meaning in English:** Supplied with necessary items.
- **Meaning in Hindi:** सुसज्जित करना या आपूर्ति करना।
- **Correct or Incorrect: Incorrect.** While "furnished" can mean supplied, it doesn't fit the context of research progressing rapidly.

(c) Advanced

- **Meaning in English:** Moved forward or made progress.
- **Meaning in Hindi:** प्रगति करना या आगे बढ़ना।
- **Correct or Incorrect: Correct.** "Advanced" is the most appropriate word here, as it suggests that scientific research progressed rapidly, which fits the context of new discoveries in cell biology.

(d) Fettered

- **Meaning in English:** Restricted or restrained.
- **Meaning in Hindi:** सीमित या प्रतिबंधित करना।
- **Correct or Incorrect: Incorrect.** "Fettered" implies restriction, which is the opposite of what the sentence is conveying about research moving forward quickly.

(e) Repaired

- **Meaning in English:** Fixed or restored to a good condition.
- **Meaning in Hindi:** मरम्मत करना या ठीक करना।
- **Correct or Incorrect: Incorrect.** "Repaired" refers to fixing something broken, which does not fit the context of scientific research advancing.

Final Answer:

The most appropriate word for blank (D) is **(c) advanced**.

S134. Ans.(a)

Sol. Let's analyze the options for blank (E) in the sentence:

"Among the most significant developments in cell biology is the study of HeLa cells, a line of human cells **(E)** from Henrietta Lacks in 1951."

(a) Taken

- **Meaning in English:** Acquired or removed from a source.
- **Meaning in Hindi:** लिया गया।
- **Correct or Incorrect: Correct.** "Taken" fits the context because HeLa cells were physically obtained from Henrietta Lacks in 1951. This accurately describes how the cells were collected.

(b) Thought

- **Meaning in English:** Believed or considered.
- **Meaning in Hindi:** सोचा गया।
- **Correct or Incorrect: Incorrect.** "Thought" relates to the process of thinking, which is irrelevant to the physical action of obtaining cells.

(c) Took

- **Meaning in English:** Past tense of "take," meaning to remove or acquire something.
- **Meaning in Hindi:** लिया।
- **Correct or Incorrect: Incorrect.** "Took" is past tense and grammatically incorrect in this sentence structure, as "taken" (past participle) is the appropriate form after "cells were."

(d) Sunk

- **Meaning in English:** Past tense of "sink," meaning to descend or go down.
- **Meaning in Hindi:** डूबा हुआ।
- **Correct or Incorrect: Incorrect.** "Sunk" has no relevance in the context of acquiring or obtaining cells.

(e) Reflected

- **Meaning in English:** To show an image or thought, or to mirror.
- **Meaning in Hindi:** परिलक्षित या प्रतिबिंबित किया।
- **Correct or Incorrect: Incorrect.** "Reflected" refers to mirroring or representing something, which doesn't fit the context of acquiring cells for research.

Final Answer:

The most appropriate word for blank (E) is **(a) taken**.

S135. Ans.(b)

Sol. Let's analyze the options for blank (F) in the sentence:

"HeLa cells have been vital for countless scientific breakthroughs, from developing the polio vaccine to advancing cancer research, **(F)** the essential role of cellular biology in modern medicine."

(a) Manifesting

- **Meaning in English:** Showing or demonstrating something clearly.
- **Meaning in Hindi:** प्रकट करना या प्रदर्शित करना।
- **Correct or Incorrect: Incorrect.** While "manifesting" means showing something clearly, it doesn't fit the context well because we are looking for a word that emphasizes the importance or role of cellular biology.

(b) Highlighting

- **Meaning in English:** Drawing special attention to or emphasizing something.
- **Meaning in Hindi:** उजागर करना या ध्यान आकर्षित करना।
- **Correct or Incorrect: Correct.** "Highlighting" is the most appropriate word, as it suggests that the breakthroughs emphasize or bring attention to the essential role of cellular biology in modern medicine.

(c) Associating

- **Meaning in English:** Connecting or linking something with another.
- **Meaning in Hindi:** जोड़ना या संबंध बनाना।
- **Correct or Incorrect: Incorrect.** "Associating" implies a connection or link, but the sentence is more about emphasizing the importance of cellular biology rather than just making a connection.

(d) Fabricating

- **Meaning in English:** Making or constructing something, often with artificial means.
- **Meaning in Hindi:** गढ़ना या निर्माण करना।
- **Correct or Incorrect: Incorrect.** "Fabricating" means creating something, often in an artificial sense, which does not fit the context of emphasizing the significance of cellular biology.

(e) Directing

- **Meaning in English:** Guiding or managing a course of action.
- **Meaning in Hindi:** निर्देशित करना।
- **Correct or Incorrect: Incorrect.** "Directing" doesn't make sense here because the sentence is not about guiding or controlling but about emphasizing the role of cellular biology.

Final Answer:

The most appropriate word for blank (F) is **(b) highlighting**.

S136. Ans.(a)

Sol. In the context of the passage, when Alia uses the idiom "hit a small snag," she is conveying the following:

Answer:

(a) They have encountered a minor issue in the API integration that may cause some delay.

Explanation:

Alia's mention of "a small snag in the API integration" indicates that they are facing a minor problem or obstacle that needs to be addressed, which may result in a slight delay in their progress. The word "small" suggests that it is not a major issue, but it still requires attention to ensure the project continues smoothly. This aligns with her later statement about being able to "smooth things over" with a little extra time.

S137. Ans.(e)

Sol. In the context of the passage, when Karan uses the idiom "loop you in once," he is conveying the following:

Answer:

(e) He plans to involve Alia in the process once the data is finalized for the presentation.

Explanation:

Karan's statement implies that he intends to include Alia in the discussion or decision-making process after he has completed the necessary work on the presentation data. By saying he will "loop you in," he indicates that he values her input and wants her to participate at that stage, ensuring that any technical aspects are addressed before finalizing the presentation.

S138. Ans.(d)

Sol. In the context of the passage, the phrase "the devil is in the details" implies the following:

Answer:

(d) It emphasizes the need to address small, overlooked issues in the project that may cause major problems later.

Explanation:

Jahnvi uses this idiom to stress that while the larger aspects of the project may seem manageable, it is the small details that often hold the potential for significant issues if not carefully addressed. This highlights the importance of ensuring that the integration is flawless, as neglecting these details could lead to bigger problems in the future.

S139. Ans.(c)

Sol. In the context of the passage, the idiom "cross the T's and dot the I's" implies the following:

Answer:

(c) To pay meticulous attention to details and ensure that everything is executed flawlessly.

Explanation:

In the passage, Jahnvi uses this idiom to emphasize the importance of focusing on the finer details of the project as they approach its completion. It signifies the need to ensure that every small aspect is considered and handled properly to avoid future issues. The phrase conveys the idea that even minor details are crucial and should not be overlooked, which aligns with the discussions about the project updates and ensuring a high-quality final product.

S140. Ans.(d)

Sol. The correct answer is (d): **aims, laundering, confiscation, along**.

Original Sentence: "The PMLA, 2002, goals to prevent money picking and provides for the annex of property obtained through or involved in money laundering, among with addressing related issues."

Analyzing the highlighted words:

1. **"Goals":**

- The word "goals" here is a noun, but the sentence requires a verb that indicates intent or purpose. The correct verb should be **"aims"** because "aims" means having a specific target or purpose, which fits the context.

2. **"Picking":**

- The phrase "money picking" does not make sense in the context of the Prevention of Money Laundering Act (PMLA). The correct term should be **"laundering,"** which refers to the illegal process of making large amounts of money generated by a criminal activity appear to have come from a legitimate source.

3. **"Annex":**

- The word "annex" is incorrect here. The correct term should be **"confiscation,"** which means the action of seizing property, especially by the government, which is appropriate in the context of dealing with illegally acquired property.

4. **"Among":**

- The phrase "among with" is incorrect. The correct phrase should be **"along with,"** which means in addition to something else, making it grammatically and contextually correct.

Now, considering all these corrections, let's look at the options:

- **(a) plans, cleaning, acquisition, amidst:** Incorrect because "plans," "cleaning," and "amidst" are incorrect replacements.
- **(b) attempts, purging, seizure, besides:** Incorrect because "purging" and "besides" do not fit the context.
- **(c) intends, bleeping, looting, amongst:** Incorrect because "bleeping" and "looting" are not contextually appropriate.
- **(d) aims, laundering, confiscation, along:** Correct. All the words are appropriate replacements in terms of meaning and context.

Corrected sentence:

The PMLA, 2002, **aims** to prevent money **laundering** and provides for the **confiscation** of property obtained through or involved in money laundering, **along** with addressing related issues.

S141. Ans.(b)

Sol. The correct answer is (b): **allows, to, seeking, for**.

Original Sentence: "General Consent authority the CBI in conduct investigations in a state without searching permission with each case."

Analyzing the highlighted words:

1. **"Authority":**

- The word "authority" as a noun is inappropriate here. The correct verb should be **"allows"** or **"enables"** to express that the General Consent gives the CBI the ability to conduct investigations. In this context, **"allows"** is more suitable because it directly indicates permission or approval for action.

2. **"In":**

- The preposition "in" is not correct here. It should be **"to"** because the CBI is allowed **to** conduct investigations.

3. **"Conduct":**

- "Conduct" is correct and doesn't need replacement.

4. **"Searching":**

- The word "searching" is incorrect. The appropriate word is **"seeking"** because it refers to asking for permission, not physically searching.

5. **"With":**

- The preposition "with" is incorrect here. The correct preposition is **"for"** as it refers to seeking permission for each case.

Now, considering all these corrections, let's look at the options:

- **(a) enables, on, executing, from:** Incorrect. "On," "executing," and "from" do not fit the context.
- **(b) allows, to, seeking, for:** Correct. All the replacements fit grammatically and contextually.
- **(c) empowers, at, demanding, by:** Incorrect. "At" and "demanding" do not work in the sentence.
- **(d) approves, for, requiring, on:** Incorrect. "Approves" and "requiring" are not the right replacements.

Corrected sentence:

General Consent **allows** the CBI **to** conduct investigations in a state without **seeking** permission **for** each case.

S142. Ans.(a)

Sol. The correct answer is (a): **signing, between, enhance, strengthen.**

Original Sentence: "The signature of the BIT among India and Uzbekistan nations will upgrades economic cooperation and deep the investment environment."

Analyzing the highlighted words:

1. **"Signature":**
 - The word "signature" is incorrect in this context because it refers to a physical act of signing rather than the formal process or agreement itself. **"Signing"** is more appropriate because it refers to the action of formally agreeing to a treaty or agreement.
2. **"Among":**
 - "Among" is incorrect because it is used when referring to more than two entities. Since the sentence refers to only two countries, the correct preposition should be **"between."**
3. **"Upgrades":**
 - The verb "upgrades" is incorrect here because "will" should be followed by the base form of a verb. **"Enhance"** is the appropriate base form, meaning to improve or increase in value.
4. **"Deep":**
 - The word "deep" is incorrect here because it is an adjective, but we need a verb. The correct verb is **"strengthen,"** meaning to make something stronger or more effective, which fits the context of improving the investment environment.

Now, considering all these corrections, let's look at the options:

- **(a) signing, between, enhance, strengthen:** Correct. All replacements fit both grammatically and contextually.
- **(b) registering, amongst, enrich, toughen:** Incorrect. "Registering" and "amongst" are incorrect, and "toughen" doesn't fit.
- **(c) subscribing, amidst, better, fortify:** Incorrect. "Subscribing" and "amidst" are incorrect.
- **(d) inking, through, improve, intensity:** Incorrect. "Inking" and "through" don't work here, and "intensity" is not a verb.

Corrected sentence:

The **signing** of the BIT **between** India and Uzbekistan nations will **enhance** economic cooperation and **strengthen** the investment environment.

S143. Ans.(c)

Sol. The correct answer is (c): **effect, approved, including, members.**

Original Sentence: "The amendment takes affect for all UN members when affirm by two-thirds of the General Assembly and ratified by two-thirds of UN members, exclusive all permanent Security Council member."

Analyzing the highlighted words:

1. **"Affect":**
 - The phrase "takes affect" is incorrect. The word "affect" is a verb, meaning to influence. Here, we need a noun. The correct word is "effect," which means the result of a change.
2. **"Affirm":**
 - The word "affirm" is incorrect in this context. It needs to be in a passive form to match the structure of the sentence. The correct word should be "approved" because it fits with the idea of formal approval in the context of the General Assembly.
3. **"Exclusive":**
 - The word "exclusive" does not fit here. The correct word should be "including" because the sentence should convey that the amendment involves the permanent Security Council members.
4. **"Member":**
 - The noun "member" should be pluralized to "members" since it refers to more than one permanent Security Council member.

Now, considering all these corrections, let's look at the options:

- **(a) affect, confirmed, excluding, member:** Incorrect, as "affect" and "excluding" are wrong.
- **(b) effects, confirm, except, countries:** Incorrect, as "effects", "confirm" and "except" do not fit well.
- **(c) effect, approved, including, members:** Correct. All words fit the context and are grammatically accurate.
- **(d) affect, verified, excluding, nations:** Incorrect, "affect" and "excluding" do not work.

Corrected sentence:

The amendment takes **effect** for all UN members when **approved** by two-thirds of the General Assembly and ratified by two-thirds of UN members, **including** all permanent Security Council **members**.

S144. Ans.(c)

Sol. The correct answer is (c) Both (i) and (iii).

Analysis:

Sentence (I):

"The Reserve Bank of India (RBI) plays a crucial role in maintaining financial stability in the country."

Sentence (II):

"Ensuring strict regulation of the banking sector is essential for the RBI."

Now, let's analyze each option:

(i) "Since the RBI plays a crucial role..."

- The word "since" indicates a causal relationship. Using "since" makes the connection that the RBI's crucial role justifies the need for strict regulation.
- Combined sentence: "Since the RBI plays a crucial role in maintaining financial stability in the country, ensuring strict regulation of the banking sector is essential for the RBI."
- This is grammatically correct and logically sound.

(ii) "However, the RBI plays a crucial role..."

- The word "however" signals a contrast or contradiction. However, there is no contrast between the two sentences; both are stating positive aspects of the RBI's responsibilities.
- Combined sentence: "However, the RBI plays a crucial role in maintaining financial stability in the country, ensuring strict regulation of the banking sector is essential for the RBI."
- This does not create a logical connection because there is no contrast. Hence, this is incorrect.

(iii) "Given that the RBI plays a crucial role..."

- The phrase "Given that" establishes a condition or context for the second clause. It emphasizes that because of the RBI's role, certain actions must follow.
- Combined sentence: "Given that the RBI plays a crucial role in maintaining financial stability in the country, ensuring strict regulation of the banking sector is essential for the RBI."
- This is also grammatically correct and logical.

S145. Ans.(c)

Sol. The correct answer is (c) Both (i) and (iii).

Analysis:

Sentence (I):

"The Kisan Vikas Patra (KVP) is a savings scheme that aims to encourage long-term investment among farmers."

Sentence (II):

"The scheme guarantees a fixed return after the maturity period."

Now, let's look at each option:

(i) "As the Kisan Vikas Patra is a savings scheme..."

- The word "as" introduces a reason or cause. In this case, it implies that because the KVP is a savings scheme, it guarantees a fixed return.
- Combined sentence: "As the Kisan Vikas Patra is a savings scheme that aims to encourage long-term investment among farmers, the scheme guarantees a fixed return after the maturity period."
- This is grammatically correct and logically coherent.

(ii) "Despite being a savings scheme, the Kisan Vikas Patra..."

- The word "despite" signals a contrast. However, there is no contrasting idea between sentences (I) and (II) — both support each other. Therefore, using "despite" does not fit in this context.
- Combined sentence: "Despite being a savings scheme, the Kisan Vikas Patra guarantees a fixed return after the maturity period."
- This creates an illogical contrast, so this is incorrect.

(iii) "Considering the Kisan Vikas Patra is a savings scheme..."

- The phrase "Considering" introduces a condition or context that justifies the second clause. It works similarly to "as," implying that because the KVP is a savings scheme, it guarantees a return.
- Combined sentence: "Considering the Kisan Vikas Patra is a savings scheme that aims to encourage long-term investment among farmers, the scheme guarantees a fixed return after the maturity period."
- This is grammatically correct and logical.

S146. Ans.(e)

Sol. The correct answer is (e) Both (i) and (iii).

Analysis:

Sentence (I):

"Digital farming is transforming agricultural practices by integrating technology into farming operations."

Sentence (II):

"It enhances productivity by using data-driven insights and automation."

Now, let's review each option:

(i) "Since digital farming is transforming agricultural practices..."

- The word "since" introduces a reason, indicating that because digital farming transforms agricultural practices, it enhances productivity.
- Combined sentence: "Since digital farming is transforming agricultural practices by integrating technology into farming operations, it enhances productivity by using data-driven insights and automation."
- This is grammatically correct and logically coherent.

(ii) "Although digital farming transforms agricultural practices..."

- The word "although" introduces a contrast or contradiction. However, there is no contradiction between the two sentences. Both sentences support each other, so "although" does not fit in this context.
- Combined sentence: "Although digital farming transforms agricultural practices by integrating technology into farming operations, it enhances productivity by using data-driven insights and automation."
- This creates an unnecessary contrast, making it incorrect.

(iii) "Given that digital farming is transforming agricultural practices..."

- The phrase "Given that" introduces a condition or context. It implies that because digital farming transforms agricultural practices, it enhances productivity.
- Combined sentence: "Given that digital farming is transforming agricultural practices by integrating technology into farming operations, it enhances productivity by using data-driven insights and automation."
- This is grammatically correct and logical.

S147. Ans.(c)

Sol. The correct answer is (c) Economic growth raises GDP but often harms the environment through resource depletion.

Explanation: In the passage, it is mentioned that "the race for GDP growth frequently comes at the cost of environmental sustainability" and "economic growth, especially in developing nations, often relies on industrialization, deforestation, and the exploitation of natural resources." These lines highlight that while GDP increases, environmental harm occurs through activities like deforestation and resource depletion. Thus, economic growth raises GDP but negatively affects the environment.

Incorrect Options:

- (a): There is no mention of economic growth increasing biodiversity in the passage.
- (b): The passage does not claim that economic growth reduces employment or that automation plays a role in environmental protection.
- (d): Economic growth is linked to greenhouse gas emissions in the passage, not the reduction of emissions, except in the context of potential future developments like renewable energy.
- (e): The passage clearly links economic growth with environmental impact, stating that the two are related, and finding a balance is a challenge.

S148. Ans.(e)

Sol. The correct answer is (e) Developed nations may have more resources to adopt climate-conscious policies, while developing nations could struggle due to their reliance on traditional industrialization for economic growth.

Explanation: The passage states that "economic growth, especially in developing nations, often relies on industrialization, deforestation, and the exploitation of natural resources." This indicates that developing nations depend on traditional, resource-intensive methods for economic growth, which makes adopting climate-conscious policies more challenging. On the other hand, developed nations may have more resources and advanced technology to implement green technologies and renewable energy sources.

Incorrect Options:

- **(a):** The passage does not suggest that developed nations can continue to grow economically without adopting climate-conscious policies.
- **(b):** The passage indicates that developing nations rely on industrialization, making it less likely they would adopt climate-conscious policies faster than developed nations.
- **(c):** The passage does not mention equal collaboration between developed and developing nations on climate-conscious policies.
- **(d):** The passage implies that developing nations do contribute to global climate issues, particularly through activities like deforestation and industrialization.

S149. Ans.(c)

Sol. The correct answer is **(c) GDP excludes environmental costs like pollution, resource depletion, and climate change.**

Explanation: The passage discusses how traditional GDP focuses on economic growth without accounting for environmental damage. It states that "many economists argue that GDP, as a metric, should evolve to account for environmental degradation and social well-being," and some propose integrating "green GDP," which would factor in the economic costs of environmental harm. This implies that traditional GDP overlooks environmental costs such as pollution and resource depletion, making it problematic when used as the sole measure of economic growth.

Incorrect Options:

- **(a):** The passage doesn't emphasize that GDP overlooks technological advancements related to sustainability and efficiency.
- **(b):** There's no mention of GDP ignoring factors like population growth and urbanization.
- **(d):** The passage doesn't suggest that traditional GDP only suits developed nations or excludes environmental impacts in developing countries.
- **(e):** The passage argues that traditional GDP excludes environmental degradation rather than including it.

S150. Ans.(a)

Sol. The correct answer is **(a) These policies are viewed as too expensive to implement and may slow down short-term economic growth.**

Explanation: The passage explains that economic growth, particularly in developing nations, often relies on activities like industrialization and resource exploitation, which boost GDP but harm the environment. It highlights the challenge for governments in balancing GDP growth with environmental protection, implying that adopting climate-conscious policies may be resisted because they could slow down short-term economic growth, especially in nations focused on traditional industrial methods.

Incorrect Options:

- **(b):** While the passage mentions renewable energy technologies, it doesn't suggest that the lack of advanced technologies is the main reason for resistance.
- **(c):** There is no mention of countries believing their contributions to climate change are minimal.
- **(d):** The passage doesn't state that climate-conscious policies are difficult to enforce.
- **(e):** The passage makes clear that climate-conscious policies are relevant to both developed and developing nations.

S151. Ans.(b)

Sol. The correct answer is **(b) contribute.**

Explanation: In the passage, the sentence mentions industries like renewable energy that not only help combat the global climate crisis but also affect GDP. The word "contribute" fits best because it implies that these industries play a role in GDP growth. Here's the meaning of the word "contribute" and the other options in both Hindi and English:

1. **Enhance** (बढ़ाना) – To improve or increase the quality, value, or extent of something.
 - Example: The new policy will enhance public health services.
 - **Hindi:** नई नीति सार्वजनिक स्वास्थ्य सेवाओं को बढ़ाएगी।
2. **Contribute** (योगदान देना) – To give something, such as money, time, or effort, in order to achieve a goal or result.
 - Example: These industries contribute to the nation's GDP.

- **Hindi:** ये उद्योग राष्ट्र की जीडीपी में योगदान देते हैं।
- 3. **Accumulate** (संचित करना) – To gather or collect a large amount of something over time.
 - Example: He managed to accumulate a large fortune.
 - **Hindi:** उसने समय के साथ बड़ी संपत्ति संचित की।
- 4. **Retrieve** (पुनः प्राप्त करना) – To get something back or recover it.
 - Example: He managed to retrieve the lost documents.
 - **Hindi:** उसने खोए हुए दस्तावेजों को पुनः प्राप्त कर लिया।
- 5. **Stimulate** (प्रोत्साहित करना) – To encourage something to become more active or to develop.
 - Example: The government's new policy will stimulate economic growth.
 - **Hindi:** सरकार की नई नीति आर्थिक विकास को प्रोत्साहित करेगी।

S152. Ans.(c)

Sol. The correct answer is **(c) provide**. Here's the explanation:

1. In sentence (A): "The company plans to _____ training sessions to help employees develop new skills."
 - The word **provide** fits because companies typically **provide** (or supply) training to their employees. This means they are offering or making available the training sessions.
2. In sentence (B): "To ensure everyone's participation, the teacher will _____ additional resources and study materials."
 - Again, **provide** is the most appropriate choice. Teachers **provide** (or supply) additional resources and materials to students. It means the teacher will make these resources available.

Meanings:

Demonstrate

- *Meaning:* To show or explain how something works or how it is done.
- *Hindi:* प्रदर्शित करना (Pradarshit karna)

Organised

- *Meaning:* To arrange or coordinate systematically; to put in order.
- *Hindi:* आयोजित करना (Ayojit karna)

Provide

- *Meaning:* To supply or make available for use.
- *Hindi:* प्रदान करना (Pradan karna)

Make

- *Meaning:* To create, form, or cause something to exist.
- *Hindi:* बनाना (Banana)

Imitate

- *Meaning:* To copy or mimic the actions, speech, or behavior of someone or something.
- *Hindi:* नकल करना (Nakal karna)

S153. Ans.(e)

Sol. The most appropriate word to fill in both blanks is **(e) mitigate**.

(A) The government implemented new policies to _____ the effects of climate change on coastal communities.

- The word **mitigate** fits because it means to reduce the severity or harmful effects of something. In this context, the government is trying to reduce the impact of climate change.

(B) Wearing masks and practicing social distancing can help _____ the spread of infectious diseases.

- Again, **mitigate** is the correct choice because wearing masks and social distancing are actions meant to lessen or reduce the spread of diseases.

Meanings:

Transmit

- *Meaning:* To send or pass something from one person or place to another (such as information, diseases, signals, etc.).
- *Hindi:* प्रसारित करना (Prasarit karna)

Foster

- *Meaning:* To encourage or promote the development or growth of something.
- *Hindi:* बढ़ावा देना (Badhaava dena)

Malign

- *Meaning:* To speak harmful or untrue things about someone; to defame or slander.
- *Hindi:* बदनाम करना (Badnaam karna)

Dominat

- *Meaning:* To have power, control, or influence over something or someone.
- *Hindi:* प्रभुत्व जमाना (Prabhutv jamaana)

Mitigate

- *Meaning:* To reduce the severity, seriousness, or painfulness of something.
- *Hindi:* कम करना (Kam karna) / हल्का करना (Halka karna)

S154. Ans.(a)

Sol. The most appropriate word to fill in both blanks is **(a) refute**.

Let's analyze the sentences:

1. **(A) The scientist presented evidence to _____ the claims made in the previous research study.**
 - The word **refute** fits because it means to disprove or reject something with evidence. In this context, the scientist is presenting evidence to disprove the earlier claims.
2. **(B) During the debate, she was able to _____ her opponent's arguments with well-documented facts.**
 - Again, **refute** is the correct word because she is discrediting her opponent's arguments by using solid facts, effectively disproving them.

Meanings:

Refute

- *Meaning:* To disprove or prove something false.
- *Hindi:* खंडन करना / खारिज करना (Khandan karna / Kharij karna)

Accept

- *Meaning:* To agree to take or receive something willingly.
- *Hindi:* स्वीकार करना (Svikar karna)

Except

- *Meaning:* To leave out or exclude something.
- *Hindi:* छोड़ना (Chhodna) / अपवाद बनाना (Apwaad banana)

Restore

- *Meaning:* To bring something back to its original or former state.
- *Hindi:* पुनर्स्थापित करना (Punarthapit karna)

Reimburse

- *Meaning:* To repay someone for an expense or loss.
- *Hindi:* प्रतिपूर्ति करना (Pratipuriti karna)

S155. Ans.(e)

Sol. The correct answer is **(e) The enduring impact of British colonial influence shaped Indian fashion trends.**

Reference from the passage:

1. **Post-Independence Influence:** The passage states:
2. *"India had recently gained independence from Britain and the presence of Edwardian sleeves was everywhere, especially in Kolkata (since it had been one of the leading cities in British times)," says Lulla, who has been studying sleeves for decades.*

This part directly links the popularity of Edwardian sleeves in India during the 1950s to the aftermath of British rule. Even though India had gained independence, the fashion trends in the country were still strongly influenced by the colonial era, especially in cities like Kolkata that had played a significant role during British rule.

3. **Fashion Trends in Cinema:** The passage also mentions:
4. *"The same puff sleeves became a trend in 1950s India when the country's cinema was taking shape, hence influencing popular culture."*

Here, it's explained that Indian cinema, which was a growing cultural force in the 1950s, adopted these Edwardian-style puff sleeves. Since cinema plays a large role in setting fashion trends, the presence of Edwardian sleeves in films helped spread their popularity throughout India. The reference to "cinema influencing popular culture" highlights that this fashion trend was not isolated but widespread, reaching many parts of society.

5. British Colonial Influence:

- The mention of Kolkata being a key city during British rule ties the Edwardian sleeve trend to India's colonial past. Kolkata, once a hub of British administrative power, had deeply embedded British cultural and fashion influences.
- Lulla's statement that Edwardian sleeves were "everywhere" during this period reinforces that the British influence had lingered, even though India had achieved independence a few years earlier.

S156. Ans.(c)

Sol. The correct answer is (c) Only (II) and (III).

Let's analyze each statement in detail with reference to the passage:

Statement (I):

"During the 1500s and 1600s, puff sleeves became famous because of their practical use."

- **Reference from the passage:** The passage states:
- *"During the 1500s and 1600s, puff sleeves became famous because of their 'cosmetic' use."*
- The term "cosmetic" clearly indicates that puff sleeves became famous for their **visual or aesthetic** appeal rather than for practical purposes.
- **Conclusion:** This statement is **incorrect** because the passage says puff sleeves were used for cosmetic reasons, not practical ones.

Statement (II):

"Edwardian sleeves were characterized by their romantic style with ruffles and lace."

- **Reference from the passage:** The passage states:
- *"Then you had the Edwardian sleeves that were romantic with ruffles and lace,"*
- This directly confirms the description of Edwardian sleeves as having a romantic style, with details like ruffles and lace.
- **Conclusion:** This statement is **correct** based on the passage.

Statement (III):

"Puff sleeves emerged during the Elizabethan and Victorian eras."

- **Reference from the passage:** The passage mentions:
- *"The Elizabethan and Victorian eras saw the emergence of puff sleeves."*
- This directly supports the idea that puff sleeves first appeared during these two eras.
- **Conclusion:** This statement is **correct** according to the passage.

S157. Ans.(d)

Sol. The correct answer is (d) They combine style and purpose, offering visual appeal while also serving functional needs like protection and comfort.

Reference from the passage:

- **Functional Aspect of Sleeves:** The passage states:
- *"But you can't forget their functional aspect."*
- This directly points to the idea that sleeves are not just about style but also serve a functional purpose.
- **Comfort in Abayas:** The passage provides the example of abayas:
- *"In many versions of the abaya, for example, the sleeves are comfortably bell-shaped so the outfit becomes more airy."*
- This shows that the design of sleeves is intended to provide comfort, combining both function and style.
- **Protection in European Clothes:** Another example in the passage is:
- *"Traditionally, European clothes had a strong presence of heavy cuffs and power shoulders to provide protection from the weather,"*
- Here, the design elements of sleeves and shoulders serve a **practical purpose** by offering protection, in addition to their visual style.

Why the other options are incorrect:

- **(a):** While design elements do contribute to the visual impact, the passage emphasizes their **functional aspect** as well, which is missing in this option.
- **(b):** The passage does mention historical trends (like Edwardian and Victorian sleeves), but the **primary purpose** discussed is not solely drawing attention to the history of fashion.
- **(c):** The passage focuses on both style and function. There is no emphasis on cultural or symbolic meanings being the **main** purpose behind design elements like sleeves and shoulders.
- **(e):** There's no mention of a deliberate attempt to create **uniformity** in style across geographical regions or time periods. In fact, the passage suggests that fashion varies across different cultures and time periods, influenced by different factors.

S158. Ans.(c)

Sol. The correct answer is (c) **Sleeves are essential, and Lulla used three-quarter puff sleeves to create a soft, feminine, youthful look.**

Explanation:

1. **Neeta Lulla's View on Sleeves:** In the passage, Lulla expresses that sleeves are an essential part of a garment, comparing them to crucial ingredients in food:
2. *"Sleeves are what 'haldi (turmeric) and dhaniya (coriander)' are to food,"* indicating their importance in creating the overall look of a garment. This shows that Lulla considers sleeves to be a foundational aspect of fashion design, not just a decorative element or something to be overlooked.
3. **How Lulla Used Sleeves in *Lamhe* to Enhance Pallavi's Character:** The passage states:
4. *"She explains how she used three-quarter, puff sleeves in the romance-drama *Lamhe* to give Sridevi's character Pallavi a soft, feminine, and youthful look."*
5. This demonstrates that Lulla carefully chose three-quarter puff sleeves to reflect Pallavi's character traits—making her appear soft, feminine, and youthful in the film.

Why other options are incorrect:

- (a): The passage does not mention full-length sleeves or suggest that Lulla aimed for a sophisticated look in *Lamhe*.
- (b): Lulla did not use puff sleeves to make Pallavi appear strong or dominant. Instead, she aimed for a soft and feminine look.
- (d): The passage does not mention sleeveless designs for Pallavi, nor is there an emphasis on modernity in this context.
- (e): Lulla does not avoid sleeves; rather, she emphasizes their importance in her designs.

S159. Ans.(d)

Sol. The correct word to complete the blank in the passage is (d) **evolution (विकास/क्रमिक परिवर्तन)**

Explanation:

The passage discusses the gradual and continuous changes in the design and significance of sleeves over time. The word "evolution" fits both **grammatically** and **contextually** because it refers to the process of gradual development or change, which is appropriate when talking about how sleeves have changed over time in fashion.

- **Contextual Fit:** The passage talks about the history of sleeves, how their styles have changed across eras and cultures, and how they are influenced by the West. The concept of **evolution** captures this ongoing, gradual transformation in fashion.
- **Grammatical Fit:** "Evolution" fits grammatically as a noun, making sense in the sentence: *"there isn't much India-specific information available on the evolution of what Neeta Lulla calls, 'one of the pillars of a piece of clothing.'"*

Why the other options are incorrect:

1. (a) **Emerge (उभरना/प्रकट होना):** This word suggests the appearance of something new, which does not reflect the continuous process described in the passage.
2. (b) **Transition (परिवर्तन/संक्रमण):** This refers to moving from one state to another, but it doesn't capture the full sense of gradual development over time that "evolution" does.
3. (c) **Transformed (बदलना/रूपांतरित होना):** This implies a sudden or significant change, which is not the focus of the passage. The passage emphasizes a more gradual process.
4. (e) **Ebbing (घटाव/क्षीण होना):** This word means a gradual decline, which is not the correct idea here, as the passage is talking about the development and ongoing changes in sleeve design, not a decline.

Therefore, (d) **evolution** is the most suitable word for both the grammatical structure and the meaning in the passage.

S160. Ans.(d)

Sol. The correct answer is (d) **Only (II).**

Let's analyze each statement carefully with reference to the passage to see which ones are incorrect:

Statement (I):

"Lulla attributes the evolution of sleeves to Western influence."

- **Reference from the passage:**
- Lulla explicitly mentions, *"When it comes to the evolution of sleeves in India, much of the influence has come from the West,"* confirming that she does attribute the evolution of sleeves to Western influence.
- **Conclusion:**
- This statement is **correct** based on the passage.

Statement (II):

"Traditionally, we mostly had wide sleeves with plain designs but lot of motifs."

- **Reference from the passage:**
- The passage actually states, "Traditionally, we mostly had slim sleeves with motifs and symbols," indicating that traditional Indian sleeves were **slim**, not wide. Also, the statement in the passage highlights that there were motifs and symbols, not just plain designs with motifs as this statement suggests.
- **Conclusion:**
- This statement is **incorrect** because it misrepresents the traditional style of sleeves in India.

Statement (III):

"Fashion is cyclical, so we're seeing various sleeve styles now."

- **Reference from the passage:**
- Lulla mentions, "Fashion moves in a cyclical way so we are seeing all kinds of sleeves right now," which directly confirms that fashion trends are cyclical, and we are seeing various sleeve styles now.
- **Conclusion:**
- This statement is **correct** based on the passage.

S161. Ans (e)

Sol.

$$P^2 - 10P + 25 = 0$$

$$P^2 - 5P - 5P + 25 = 0$$

$$P = 5, 5$$

$$y = 5$$

$$\text{Given, } \frac{y}{5} = \frac{11}{z+1}$$

$$\frac{5}{5} = \frac{11}{z+1}$$

$$1 = \frac{11}{z+1}$$

$$z + 1 = 11$$

$$z = 10$$

Quantity I. $10z = 10 (10) = 100$

Quantity II. 100

So, Quantity I = Quantity II

S162. Ans (b)

Sol. Let the age of A after four years and the present age of B be $5x$ years and $6x$ years respectively.

The present age of A = $5x - 4$ years

And the present age of C = $6x + 12$ years

ATQ,

$$(5x - 4) + 6x + (6x + 12) = 65 \times 3$$

$$17x + 8 = 195$$

$$17x = 187$$

$$x = 11$$

Quantity I. 440

Quantity II. Present ages of B = $6x = 6 \times 11 = 66$ years

Present ages of C = $6x + 12 = 6 \times 11 + 12 = 78$ years

Required value = $6 \times (66 + 78) = 864$

So, Quantity I < Quantity II

S163. Ans (e)

Sol. The pattern of the series:

1600,	1608,	1544,	1760,	1248,	2248
+8	-64	+216	-512	+1000	
2^3	4^3	6^3	8^3	10^3	

S164. Ans (c)

Sol. The pattern of the series:

275, 55, 165, 33, 99, 19.8
 $\div 5$ $\times 3$ $\div 5$ $\times 3$ $\div 5$

S165. Ans.(a)

Sol. The pattern of the series:

20000, 500, 25, 2.5, 0.5, 0.2
 $\div 40$ $\div 20$ $\div 10$ $\div 5$ $\div 2.5$

S166. Ans.(d)

Sol. The pattern of the series:

Subtraction of consecutive prime number

1001 934 863 790 711 628 539
 -67 -71 -73 -79 -83 -89

Sol. (167-172)

In 2012

Ore extraction by X = 150 kg

A type ore extraction by X = $150 \times \frac{40}{100} = 60$ kg

B type ore extraction by X = $150 - 60 = 90$ kg

Ore extraction by Y = 90 kg

A type ore extraction by Y = $90 - 30 = 60$ kg

B type ore extraction by Y = 30 kg

Similarly,

Years	A type ore extraction by company X (in kg)	B type ore extraction by company X (in kg)	A type ore extraction by company Y (in kg)	B type ore extraction by company Y (in kg)
2012	60	90	60	30
2013	90	90	75	135
2014	210	140	45	75
2015	180	60	70	90

S167. Ans.(c)

Sol. Total quantity of A type ore extraction by Y in 2014 and 2012 together

= $60 + 45 = 105$ kg

Total quantity of B type ore extraction by X in 2014 and 2015 together

= $140 + 60 = 200$ kg

Required percentage = $\frac{105}{200} \times 100 = 52.5\%$

S168. Ans.(e)

Sol. Total quantity of A type ore extraction by Y in 2017 = $\frac{5}{3} \times 60 = 100$ kg

Total quantity of B type ore extraction by Y in 2017 = $\frac{1}{2} \times 180 = 90$ kg

Total quantity of ore extraction by Y in 2017 = $100 + 90 = 190$ kg

Required difference = $190 - 150 = 40$ kg

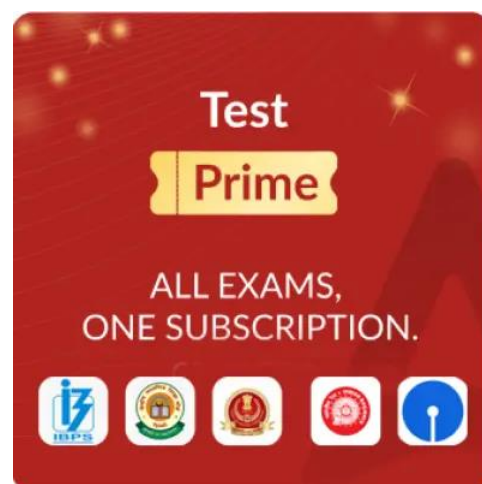
S169. Ans.(d)

Sol. B type ore extraction by company X in 2011 = $\frac{90}{18} \times 13 = 65$ kg

A type ore extraction by company X in 2011 = $\frac{180}{120} \times 100 = 150$ kg

Total quantity of ore extraction by company X in 2011 = $65 + 150 = 215$ kg

Required ratio = $215 : 120 = 43 : 24$



S170. Ans.(a)

Sol. A type ore extraction by company X in 2017 = $73 \times 3 - (60+90) = 69$ kg

Total quantity of ore extraction by company X in 2017 = $1.5 \times 160 = 240$ kg

B type ore extraction by company X in 2017 = $240 - 69 = 171$ kg

S171. Ans.(b)

Sol. B type ore extraction by company X in 2013 and 2015 together = $90 + 60 = 150$

A type ore extraction by company X in 2012 and A type ore extraction by company Y in 2014 = $60 + 45 = 105$

Required difference = $150 - 105 = 45$ kg

S172. Ans.(d)

Sol. D type ore extraction by company X in 2016 = $\frac{5}{4} \times \frac{60+75+45}{3} = 75$ kg

D type ore extraction by company Y in 2016 = $\frac{2}{5} \times 90 = 36$ kg

Required sum = $75 + 36 = 111$ kg

Sol. (13-18)

Total number of products manufactured by A = $20000 \times \frac{20}{100} = 4000$

Total number of products sold by A = $\frac{15}{100} \times 12000 = 1800$

Total number of unsold products by A = $4000 - 1800 = 2200$

Similarly

Companies	Total number of products manufactured	Total number of products sold	Total number of unsold products
A	4000	1800	2200
B	3000	2160	840
C	5000	3480	1520
D	2000	1440	560
E	6000	3120	2880

S173. Ans.(a)

Sol. Required answer = $2200 + 840 + 1520 = 4560$

S174. Ans.(b)

Sol. Total products manufactured by F = $2500 \times 3 - (3000 + 2000) = 2500$

Total products sold by F = $\frac{1}{3} \times 1800 = 600$

Total number of unsold products by F = $2500 - 600 = 1900$

S175. Ans.(c)

Sol. The total number of products manufactured by A in 2023 = $\frac{137.5}{100} \times 4000 = 5500$

Total number of unsold products by A in 2023 = 2200

Total number of products sold by A in 2023 = $5500 - 2200 = 3300$

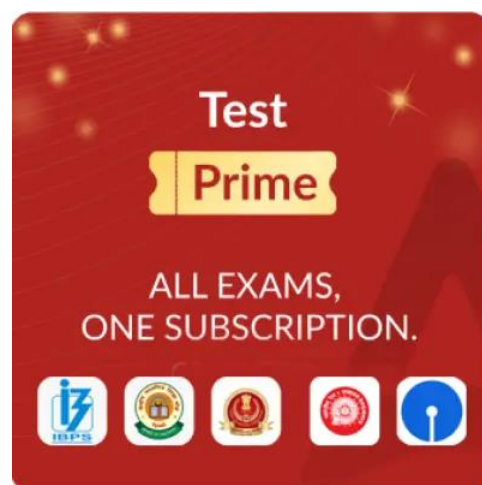
Required percentage = $\frac{3300-1800}{1800} \times 100 = 83.33\%$

S176. Ans.(c)

Sol. Total number of products sold by D and E = $1440 + 3120 = 4560$

Total number of products unsold by C and A = $2200 + 1520 = 3720$

Required difference = $4560 - 3720 = 840$



S177. Ans.(e)

Sol. The total number of products manufactured by X = $\frac{60}{100} \times 6000 = 3600$

The total number of unsold products by X = $\frac{840}{7} \times 11 = 1320$

The total number of sold products by X = $3600 - 1320 = 2280$

Required percentage = $\frac{2280}{5000} \times 100 = 45.6\%$

S178. Ans.(a)

Sol. Total number of non-defective products manufactured by E = $6000 \times \frac{75}{100} = 4500$

Total number of defective products manufactured by E = $6000 \times \frac{25}{100} = 1500$

Total number of defective products unsold by E = $\frac{2}{5} \times 1500 = 600$

Total number of non-defective products unsold by E = $2880 - 600 = 2280$

Total non-defective products sold by E = $4500 - 2280 = 2220$

Required ratio = $2220 : 2280 = 37:38$

S179. Ans.(b)

Sol. Let radius of cylinder = x cm

So, height of the cylinder = 2x cm

$$2 \times \frac{22}{7} \times r \times h = 616$$

$$x^2 = 49$$

$$x = 7$$

So, height of the cylinder = 14 cm

$$\text{Cone radius} = 7 \times \frac{1}{2} = 3.5 \text{ cm}$$

$$\text{Quantity I: Total surface area of cylinder} = 2 \times \frac{22}{7} \times 7 \times 21 = 924 \text{ cm}^2$$

$$\text{Required difference} = 924 - 616 = 308 \text{ cm}^2$$

$$\text{Quantity II: lateral height of cone} = \sqrt{196 + 12.25} = \sqrt{208.25} \text{ cm}$$

$$\text{Curved surface area of the cone} = \frac{22}{7} \times 7 \times \sqrt{208.25} = 317.47 \text{ cm}^2 \text{ (approx.)}$$

So, **Quantity I < Quantity II**

S180. Ans.(d)

Sol. ATQ,

$$\frac{x-5000}{x+2000} = \frac{5}{7}$$

$$7x - 35000 = 5x + 10000$$

$$2x = 45000$$

$$x = 22500$$

So, Investment of A and B is Rs 17500 and Rs 24500 respectively.

We have no data about R so, we find the difference between their interest

So, can't be determined

S181. Ans.(e)

$$\text{Sol. } a = 625 - 125 = 500$$

Cost price = Rs 500

Selling price = Rs 1000

Marked price = $500 + 700 = \text{Rs } 1200$

New cost price = $500 + 100 = \text{Rs } 600$

New selling price = $\text{Rs } 1000 + 100 = \text{Rs } 1100$

$$\text{Required difference} = (1100 - 600) - (1200 - 1100) = 500 - 100 = \text{Rs } 400$$

S182. Ans.(b)

Sol. One day work of A, B & C together = $\frac{13}{P}$

One day work of A & B together = $\frac{10}{P}$

One day work of C = $\frac{13}{P} - \frac{10}{P} = \frac{3}{P}$

Time taken by C alone to complete the work = $\frac{P}{3}$ days

One day work of A & B together = $\frac{10}{P}$

One day work B = $\frac{4}{P}$

One day work A = $\frac{10}{P} - \frac{4}{P} = \frac{6}{P}$

Time taken by A alone to complete the work = $\frac{P}{6}$ days

ATQ,

$$\frac{P}{3} - \frac{P}{6} = 20$$

$$\frac{P}{6} = 20$$

$$P = 120$$

S183. Ans.(d)

Sol. Let Rahul initial investment = $2x$ Rs

After, five month Rahul investment = $2x \times \frac{150}{100} = 3x$ Rs

Vikas investment after seven months = $7000 \times \frac{7}{10} = 4900$ Rs

Profit ratio of Rahul to that of Vikas = $(2x \times 5 + 3x \times 7) : (7000 \times 7 + 4900 \times 5)$
= $31x : 73500$

ATQ

$$\frac{31x}{73500} = \frac{1550}{3020-1550}$$

$$x = 2500$$

Rahul initial investment = $2x = \text{Rs } 5000$

So, $X = 5000$

S184. Ans.(c)

Sol. Given, we subtract 311 from the number, then we receive 13 as the resultant

Number = $311 + 13 = 324$

So, three digit number = 324

Sum of digit = $3 + 2 + 4 = 9$

Sol. (25 -27):

Let total unsold flats in society A = y

So, total flats sold in society A = $y + 1.5x$

Given, all the flats were sold in society C

So, total sold flats in C = $42 \times \frac{10}{4} = 140$

Let total flats (sold + unsold) in society A = X

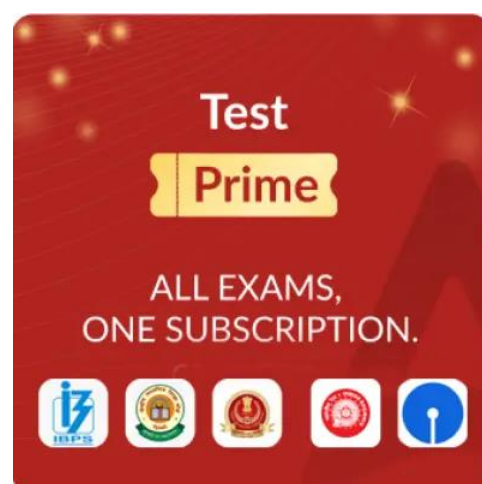
ATQ,

$$(42+78) + 140 + 2X = 612$$

$$2X = 612 - 260$$

$$2X = 352$$

$$X = 176$$



S185. Ans.(b)

Sol. Given, $61 + 1.5x = 176 - 61$

$$3x/2 = 115 - 61$$

$$3x/2 = 54$$

$$x = 36$$

S186. Ans.(d)

Sol. New number of sold flats from society B = $42 + 28 = 70$

New unsold flats in society B = $78 - 28 = 50$

Required ratio = $50 : (70 + 140) = 50 : 210 = 5 : 21$

S187. Ans.(e)

Sol. Total sold flats in society in D = $176/4 = 44$

Required difference = $140 - 44 = 96$

S188. Ans.(e)

Sol. Speed of train A (in m/sec.) = $180 \times \frac{5}{18} = 50$ m/sec .

Length of train A = $50 \times 4 = 200$ meters

Relative speed of train A and B = $\frac{200}{10} = 20$ m/sec.

So, speed of train B = $50 - 20 = 30$ m/sec.

Quantity I: Speed of train B = 30 m/sec.

Quantity II: New speed of train A = $50 - 20 = 30$ m/sec.

So, **Quantity I = Quantity II**

S189. Ans.(a)

Sol. Let speed of train A and B be $5x$ m/sec. & $9x$ m/sec. respectively

ATQ,

$$\frac{d+300}{5x} = \frac{d+700}{9x}$$

$$9d + 2700 = 5d + 3500$$

$$4d = 800$$

$$d = 200$$

S190. Ans.(c)

Sol. Total toffies B and C has = $60 - 25 = 35$

Let total toffies B has = x

So, total toffies C has = $x - 5$

ATQ, $2x - 5 = 35$

$$2x = 40$$

$$x = 20$$

Let y toffies added with C to found resultant ratio

So,

$$\frac{15+y}{20} = \frac{6}{4}$$

$$15 + y = 30$$

$$y = 15$$

S191. Ans.(d)

Sol. ATQ,

$$\frac{a}{100} = \frac{(95-2a)}{100} \times \frac{9}{20}$$

$$20a = 855 - 18a$$

$$38a = 855$$

$$a = \frac{45}{2}$$

So, amount spent on EMI = $\frac{55}{200} \times 30000 = 8250$ Rs

S192. Ans.(d)

Sol. ATQ, $2 \times (2\pi r) = 176$

$$2\pi r = 88$$

$$\pi r = 44$$

$$r = 14 \text{ cm}$$

Volume of the cylinder = $\pi r^2 h$

$$196h = 3528$$

$$h = 18$$

$$\text{Side of the square} = 18 \times \frac{4}{3} = 24 \text{ cm}$$

$$\text{Required area} = 24 \times 24 = 576 \text{ cm}^2$$

S193. Ans.(d)

Sol. Form approx. type of questions we should take approx. values

So, four years 11 months and 28 days = 5 years

two years 2 days = 2 years

$$1056.4 \text{ Rs} = 1056 \text{ Rs}$$

Equivalent rate of interest at rate of 20% p.a. for two years on compound interest annually

$$= (20 + 20 + \frac{20 \times 20}{100})\% = 44\%$$

Let amount invested in first scheme = $100x$ Rs

$$\text{So, amount invested in second scheme} = 100x + 100x \times \frac{12 \times 5}{100} = 160x \text{ Rs}$$

ATQ,

$$160x \times \frac{44}{100} = 1056$$

$$1.6x = 24$$

$$x = 15$$

$$\text{So, } 100x = 1500$$

S194. Ans.(e)

Sol. Let present age of A = x

So, present age of B = $3x$

Let present age of C = y

ATQ

$$y - 1 = 2(x - 1)$$

$$y = 2x - 1$$

$$\text{And, } 3x - 2x + 1 = 21$$

$$x = 20$$

$$\text{So, } 3x = 60$$

$$y = 40 - 1 = 39$$

$$\text{Required ratio} = 60 : (39 + 3) = 10 : 7$$

S195. Ans.(e)

Sol. Distance travelled by boat in downstream = $\frac{3x}{5}$ km

$$\text{ATQ, } \frac{2x}{5(4)} - \frac{3x}{5(20)} = 14$$

$$\frac{10x - 3x}{100} = 14$$

$$x = 200$$

$$\text{Distance covered in downstream} = 200 \times \frac{3}{5} = 120 \text{ km}$$

Sol (36-40)

Let Y be $100x$.

Cost price of article bought by A = $100x$

Cost price of article bought by B = $150x$
 Cost price of article bought by C = $200x$
 Marked price of article by A = $100x + 100$
 Selling price of article by A = $100x + 40$
 Discount = $100x + 100 - (100x + 40) = 100 - 40 = 60$
 Cost price of article B = $150x = 5 (60)$
 $2 = x$

For A,

Cost price = Rs 200 = Y, selling price = 240, marked price = 300

$d\% = 60/300 \times 100 = 20\%$

profit % = 20%

Cost price of article bought by B = Rs 300

Cost price of article bought by C = Rs 400

S196. Ans.(a)

Sol. Value of d = 20%

S197. Ans.(a)

Sol. $Y = 100x = 200$

S198. Ans.(e)

Sol. Required answer = $40 \times \frac{40 \times 15 \times 5}{100} = \text{Rs. } 1200$

S199. Ans.(d)

Sol. Marked price by C = 130% of 400 = Rs.520

Selling price = $520 - 49 = \text{Rs } 471$.

Required answer = $471 - 240 = \text{Rs } 231$

S200. Ans.(d)

Sol. Let the profit get by C be p.

So profit get by B be 2p.

$$\frac{2p \times 12}{p \times X} = \frac{6}{1}$$

X = 4 months

