

Test-I: English Language

Directions (Q. 1-10): Which of the phrases given against the sentences should replace the word/phrase given in bold in the sentence to make it grammatically correct? If the sentence is correct as it is given and no correction is required, select 'No correction required' as the answer.

- The presence of new players in the basketball team is to **additionally attract** for the audience.
1) with add attraction 2) for adding attractive
3) an added attraction 4) of adding attraction
5) No correction required
- The dire need of amusement to **escaping boredom** made him cultivate various hobbies.
1) to escape boredom 2) as escaping boredom
3) escapes bored 4) for escape being bored
5) No correction required
- We were credibly informed that the conman has **gave himself** to the police.
1) given over 2) given himself in
3) given himself over 4) given himself up
5) No correction required
- We tempted Karen with many promises but nothing would **worked her up**.
1) working with her 2) works her over
3) works upon her 4) work on her
5) No correction required
- The soil of India **saw growths** of one of the oldest cultures in the world that is the Harappan Civilisation.
1) seen the growth 2) saw the growth
3) had saw growing 4) see the growths
5) No correction required
- A renowned organisation has **recent appointed** a highly acclaimed scientist to head new research and development assistants.
1) recently appointed 2) a recent appointed
3) is to appoint 4) to recently appointed an
5) No correction required
- The serene lush green slope of the hill station **make it up ideal** venue for the meditation camp.
1) making so ideal 2) is ideal for
3) makes it an ideal 4) as of ideal
5) No correction required
- Taking good care of yourself is **paramount for** succession of your goals.

- 1) about being a success 2) to the success
3) about being successful 4) to succeed
5) No correction required
- The tambourine to **gain popularity** in the mid-18th century in Western Europe as an orchestral instrument.
1) was been popular 2) have popularity
3) has being popular 4) gained popularity
5) No correction required
- Varun advised Aman that **give off** wrong pleasure is not self-sacrifice but self-culture.
1) gave up 2) gives away
3) giving through 4) giving up
5) No correction required

Directions (Q. 11-20): Read the following passage and answer the given questions. Certain words/phrases are given in bold to help you locate them while answering some of the questions.

There is a market failure in cyber security. Solutions being suggested or tried include increasing transparency about data losses, helping consumers and firms to make more informed decisions about cyber security; shedding more light on how internet service providers (ISPs) tackle malware infections they spot on customers' computers; and using liability laws to force software companies to produce safer code. On transparency, America has led the way. Almost all American states now have data-breach laws that require firms to reveal any loss of sensitive customer information. In Europe telecom firms have been obliged to notify customers of breaches for some time now, and there are plans to extend reporting to a wider range of industries.

Breach laws have encouraged insurance companies to offer coverage against potential losses. This is helpful because they are in a position to gather and share information about best practices across a wide range of companies. A cyber-insurer advises companies on defensive tactics, and also on how to minimise the damage if something goes wrong. The American government should create a cyber-equivalent of the National Transportation Safety Board, which investigates serious accidents and shares information about them. Such a body could look into all breaches that cost over \$50m and make sure the lessons are shared widely. But insurers are likely to remain wary of taking on **broader** risks because the costs associated with a **serious** cyber-incident could be astronomical. Insurers can deal with acts of God, but not with acts of Anonymous (hacking groups or acts of state-

sponsored hacking). This explains why the overall cyber-insurance market is still small. Governments are weighing in too, not least by supporting private-sector efforts to clean up “botnets”, or networks of compromised computers controlled by hackers. These networks, which are prevalent in countries such as America and China, can be used to launch attacks and spread malware. In Germany an initiative called Bot-Frei, which helps people clean up their infected computers, received government support to get started, though it is now self-financing. The American government has also worked closely with private firms to bring down large botnets. Another strategy involves issuing standards to encourage improved security. America’s National Institute of Standards and Technology published a set of voluntary guidelines for companies in critical infrastructure sectors such as energy and transport. Britain has also launched a scheme called “cyber-essentials” under which firms can apply for a certificate showing they comply with certain minimum security standards. Applicants undergo an external audit and, if successful, are awarded a badge which they can use on marketing materials. Whether governments are best placed to set minimum standards is debatable, but they have certainly raised awareness of cyber security as an issue that needs attention. They could also help to get more information into the public domain. Researchers have argued persuasively that collecting and publishing data about the quantity of spam and other bad traffic handled by ISPs could encourage the worst performers to do more to tackle the problem, thus improving overall security.

Another debate has revolved around getting software companies to produce code with fewer flaws in it. One idea is to make them liable for damage caused when, say, hackers exploit a weakness in a software program. Most software companies currently insist customers accept end-user licensing agreements that specifically protect firms from legal claims unless local laws prohibit such exclusions. The snag is that imposing blanket liability could have a **chilling** effect on innovation. Companies that are selling millions of copies of programmes might take fright at the potential exposure and leave the business. Strict liability be applied only to firms which produce software that cannot be patched if a security flaw is found. There is quite a lot of that sort of code around.

11. Which of the following is the **SAME** in meaning as the word **BROADER** as used in the passage?
- 1) spacious
 - 2) subtle
 - 3) weaker
 - 4) comprehensive
 - 5) approximate
12. Which of the following is/are the argument(s) in favour of cyber-essentials?
- (A) It boosts transparency and promotion of firms.
 - (B) The certification is given by hackers which makes it authentic.

- (C) Firms benefit from paying attention to cyber-security and so do users.
- 1) Only (A)
 - 2) Only (B)
 - 3) Only (A) & (C)
 - 4) Only (B) & (C)
 - 5) All (A), (B) & (C)
13. Which of the following is the **SAME** in meaning as the word **TRIED** as used in the passage?
- 1) convicted
 - 2) accused
 - 3) attempted
 - 4) exasperated
 - 5) None of the given options
14. Which of the following is the **OPPOSITE** of the word **SERIOUS** as used in the passage?
- 1) genuine
 - 2) witty
 - 3) noisy
 - 4) insignificant
 - 5) irresistible
15. Which of the following is the **OPPOSITE** of the word **CHILLING** as used in the passage?
- 1) promoting
 - 2) reassuring
 - 3) encouraging
 - 4) fostering
 - 5) All the given options
16. Which of the following best describes the author’s view of liability laws?
- 1) These will act as incentives for computer firms to produce more secure software.
 - 2) These are pointless as they cannot be uniformly or strictly implemented.
 - 3) These will not greatly impact computer firms as the financial profits from software are huge.
 - 4) These are not an appropriate approach to cyber security.
 - 5) None of the given options
17. Which of the following can be said about governments’ efforts with regard to cyber security?
- (A) Governments’ efforts have been coupled with private sector co-operation.
 - (B) Governments’ efforts have been focused on destroying botnet infrastructure.
 - (C) These are not worthwhile and too small in magnitude.
- 1) Only (A)
 - 2) Only (B)
 - 3) Only (B) and (C)
 - 4) Only (C)
 - 5) Only (A) and (B)
18. Why has the author mentioned the National Transportation Safety Board in the passage?
- (A) To urge America to set up a body to share data in cyber-related instances
 - (B) To monitor cyber security episodes whose losses are over a certain sum
 - (C) To publish and enforce standards for cyber security for sectors like energy
- 1) Only (A)
 - 2) Only (A) & (B)
 - 3) Only (B)
 - 4) Only (B) & (C)
 - 5) All (A), (B) & (C)
19. Which of the following is/are (the) theme(s) of the passage?
- 1) Holding cyber firms accountable for flaws in their products
 - 2) Cyber-crime infrastructure in certain countries

- 3) Ways to secure cyber-space
 - 4) Limits of cyber-insurance
 - 5) All the given options are themes
20. Which of the following is/are true in the context of the passage?
- 1) Breach laws can be helpful for organisations.
 - 2) America is leading the way in terms of laws for disclosure of cyber-breaches.
 - 3) Pressure is increasing on software companies to produce safer products.
 - 4) Varied efforts are being made to create a market which values cyber-security.
 - 5) All the given options are true in the context of the passage

Directions (Q. 21-30): In the given passage there are words highlighted in bold and underlined. You have to decide if the word given is correct (in terms of grammar and context). If not, find out the appropriate word/group of words from the given options. In case, the suggested word is correct, mark the option 'The given word is correct' as your answer.

Everyone knows that (21) sustenance brainboxes is good for an economy. In Thailand, school reformers have an extra incentive to narrow (22) contrasting between rich people in cities and their poorer rural cousins, which have (23) fulfilled to a decade of political tension and occasional eruptions of violence. For years shoddy teaching has favoured urban children whose parents can afford to send them to cramming schools or to study abroad. Dismal instruction in the countryside has made it easier for city slickers from posh colleges to paint their political opponents as pliable bumpkins.

The dangerous social divide is all the more reason to (24) worry about Thailand's poor rating in an educational league table published in December. Thailand limped into the bottom quarter of 70 countries whose pupils participated in the mathematics, reading and science tests organised under the Programme for International Student Assessment (PISA). Its scores have (25) crushed since a previous assessment in 2012, when researchers found that almost one-third of the country's 15-year-olds were "functionally illiterate", including almost half of those studying in rural schools.

Thailand's (26) error performance is not dramatically out of step with countries of similar incomes. But it is strange given its unusually generous (27) allocation on education, which in some years has hoovered up more than a quarter of the budget. Rote learning is common. There is a shortage of maths and science teachers, but a (28) overflow of physical-education instructors. Many head teachers lack the authority to hire or fire their own staff. A big problem is that Thailand spends too much money propping up small schools, where teaching is the poorest. Almost half of Thai schools have fewer than 120

students, and most of those have less than one teacher per class. Opening lots of village schools once helped Thailand (29) achieve impressive attendance rates, but road-building and other improvements in infrastructure mean most schools are now within 20 minutes of another. Over the next ten years falling birth rates will reduce school rolls by more than 1m, making it ever more (30) fulfilled for tiny institutions to provide adequate instruction at a reasonable cost.

21. 1) diluting 2) nurturing 3) alleviating
4) ornamental 5) The given word is correct
22. 1) contracts 2) characteristic 3) distinct
4) differences 5) The given word is correct
23. 1) preceded 2) managed 3) compelled
4) led 5) The given word is correct
24. 1) concern 2) apprehension 3) fearful
4) distress 5) The given word is correct
25. 1) deteriorated 2) sink 3) decomposed
4) declining 5) The given word is correct
26. 1) extreme 2) cheerful 3) dismal
4) inauspicious 5) The given word is correct
27. 1) employed 2) investing 3) spending
4) setting 5) The given word is correct
28. 1) satiety 2) surplus with 3) saturated
4) surfeit 5) The given word is correct
29. 1) complete 2) conclude 3) acquired
4) adhere 5) The given word is correct
30. 1) difficult 2) ambition 3) troubling
4) doubtful 5) The given word is correct

Test-II: Reasoning Ability

31. Five movies D, E, F, G and H are released on five different days of the same week starting from Monday and ending on Friday, but not necessarily in the same order. F is released on one of the days before Thursday. Only two movies are released between F and G. H is released immediately before G. D is released on one of the days after H. Which movie is released on Wednesday?
1) E 2) Either G or D 3) G
4) H 5) F
32. Four cartons A, B, Y and Z are placed above one another but not necessarily in the same order. Each

carton contains a different drink—Pepsi, Coffee, Frooti and Milkshake – but not necessarily in the same order. Only carton B is kept between the cartons of Pepsi and Frooti. The carton of Coffee is kept immediately below carton of Frooti. The carton of Coffee is kept at one the position below Z. What is the position of the carton of Milkshake in the stack?

- 1) Cannot be determined
- 2) Immediately below the carton of Frooti
- 3) First from the bottom
- 4) First from the top
- 5) Immediately above the carton of Coffee

Directions (Q. 33-35): Study the following information and answer the given questions.

Each of the six stores P, Q, R, S, T and U sold different number of books in one day. Only three stores sold less books than U. P sold more books than R. T did not sell the highest number of books. S sold more books than R and P but less than U. The store which sold the second highest number of books sold 72 books.

33. How many books did Q probably sell?
1) 43 2) 58 3) 71 4) 65 5) 89
34. Which of the following stores sold the second lowest number of books?
1) T 2) P 3) S 4) R 5) Q
35. If the total number of books sold by P and T is 125, then how many books did P sell?
1) 51 2) 76 3) 68 4) 45 5) 53
36. In a vertical queue of 13 people, all facing north, K stands exactly at the centre of the queue. No one stands between K and W. Only five people stand between W and P. L stands at one of the positions before P but not at the beginning of the queue. How many people stood after W?
1) Three 2) None 3) Five
4) Can't be determined 5) Seven
37. In which of the given expressions, does the expression 'C < P' definitely hold false?
1) $P \geq A \geq L \leq E; C < L \geq O > N$
2) $P < A \leq L \geq E; C \geq L \leq O < N$
3) $P = A > L = E; C = L > O < N$
4) $P > A > L > E; C < L < O < N$
5) $P = A \geq L < E; C < L \geq O \geq N$
38. A person starts from Point A, walks 30m towards south and reaches Point B. He then takes a right turn and walks 7m, he takes a right turn, and walks for 6m. He then takes a right turn and walks 7m. He takes a final left turn, walks a certain distance and reaches Point R. Point R is 17m to the north of Point B. What is the distance between Point A and Point R?
1) 18m 2) 23m 3) 21m 4) 27m 5) 13m

39. S is the only son of V. V is married to R. M is daughter of R. R is grandmother of A. How is S definitely related to A?

- 1) Uncle 2) Cannot be determined
- 3) Father 4) Son-in-law
- 5) Father-in-law

40. What should come in place of \$ and # respectively in the expression:
 $P > A \$ R < O < T; S < L < A \# M$, so that the expression $T > M$ definitely holds true?

- 1) $>, <$ 2) $<, =$ 3) $<, <$ 4) $<, \leq$ 5) $>, >$

Directions (Q. 41-45): Study the following information and answer the given questions.

C, D, E, F, W, X, Y and Z have to attend a wedding in January, April, September and December of the same year. In each month the wedding on is either the 11th or on 24th of the month. Not more than two of the given people have to attend a wedding in the same month.

W has to attend a wedding on 11th of the month which has only 30 days. Only three people have to attend a wedding between W and Y. C and Y have to attend a wedding neither on the same date nor in the same month. C does not have to attend a wedding in April. Only two people have to attend a wedding between C and F. X and F have to attend a wedding on the same date. D has to attend a wedding on one of the days before X. Only one person has to attend a wedding between D and E. Less than four people have to attend a wedding between E and Z.

41. How many people have to attend a wedding between F and Z?
1) Two 2) Three 3) None
4) More than three 5) One
42. When does X have to attend a wedding?
1) 24th April
2) Cannot be determined
3) 11th January
4) 24th September
5) 11th December
43. If all the people are made to attend the wedding in alphabetical order starting from 11th January and ending on 24th December, then the schedule of how many people will remain unchanged?
1) One 2) Two 3) Five
4) None 5) Three
44. Who among the following has/have to attend a wedding before Y?
1) Both C and X 2) Only W 3) None
4) Both F and W 5) Only F
45. As per the given arrangement, four of the following five are alike in a certain way and so form a group. Which of the following does not belong to the group?
1) W 2) F 3) Z 4) Y 5) X

Directions (Q. 46-48): In the question, relationship between different elements is shown in the statements. The statements are followed by two conclusions. Study the conclusions based on the given statements and select the appropriate answer.

46. **Statement:** $M < O < U \leq R \leq T; P \geq R \leq I \leq C < L$
Conclusions: I. $L > M$ II. $O \leq C$
 1) Either conclusion I or II is true
 2) Neither conclusion I nor II is true
 3) Only conclusion II is true
 4) Both conclusion I and II are true
 5) Only conclusion I is true

47. **Statements:** $C < L = I \leq N > G; I < M \geq O > R > T$
Conclusions: I. $C < O$ II. $G > T$
 1) Neither conclusion I nor II is true
 2) Only conclusion I is true
 3) Both conclusion I and II are true
 4) Only conclusion II is true
 5) Either conclusion I or II is true

48. **Statements:** $M < O \leq U \leq R \geq T; P \geq R \leq I \leq C < L$
Conclusions: I. $P > T$ II. $P = T$
 1) Only conclusion I is true
 2) Neither conclusion I nor II is true
 3) Both conclusion I and II are true
 4) Only conclusion II is true
 5) Either conclusion I or II is true

Directions(Q. 49-53): Read the given information to answer the given questions.

Eight people X, G, T, C, P, J, A and M live on different floors of a building. The ground floor of the building is numbered one, the one above that is numbered two and so on till the topmost floor is numbered eight. All of them can perform a different form of dance – Kathak, Garba, Dandiya, Bhangra, Lavani, Odissi, Mohiniyattam and Sattriya.

(Note: None of the given information is necessarily in the same order.)

T lives on an even-numbered floor below floor number five. Only three people live between T and the one who performs Garba. As many people live below T as above the ones who performs Lavani. The number of people living between the ones who perform Garba and Lavani is equal to the number of people living between C and P. C lives on an even-numbered floor above P. Neither C nor P performs Garba or Lavani. The one who performs Kathak lives on an odd-numbered floor below floor number four. P does not perform Kathak. The number of people between T and the one who performs Kathak is same as the number of people living between X and the one who performs Lavani. X lives on one of the floors above the one who performs Lavani. The number of people living between C and X is equal to the number of people living between T and M. The one who performs Odissi lives on an even-numbered floor immediately above the one who performs Bhangra. Only three people live between G and J. G lives on one of the floors above J. The one who performs Dandiya lives immediately above the one who performs Sattriya.

49. Which of the following statements is true as per the given arrangement?
 1) C performs Odissi.

- 2) The one who performs Garba lives on floor number six.
 3) T lives immediately above J.
 4) None of the given statements is true
 5) Only two people live between M and G.

50. Four of the following five are alike in a certain way based on the given arrangement and thus form a group. Which of the following does not belong to the group?

- 1) M-Bhangra 2) C-Dandiya
 3) P-Odissi 4) G-Floor number eight
 5) J-Floor number two

51. How many people live between the ones who perform Lavani and Bhangra?

- 1) More than three 2) Three
 3) None 4) One 5) Two

52. Who performs Sattriya?

- 1)G 2)A 3)P 4)T 5)C

53. Which dance does M perform?

- 1) Bhangra 2) Lavani 3) Odissi
 4) Mohiniyattam 5) Kathak

Directions (Q. 54-58): Study the given information carefully to answer the given questions.

Eight people A, B, C, D, E, F, G and H were born in different years, viz 1961, 1970, 1974, 1980, 1983, 1987, 1996 and 2000 but not necessarily in the same order.

NOTE: (A) All calculations are done with respect to the present year, 2017, assuming the month and date to be the same as that of the years of birth as mentioned above.

(B) Each person is assumed to be born on the same date and same month of the respective years.

D was born after 1983 but not in the year 2000. The sum of the present ages of A and D is 64. The difference between the present ages of A and G is less than 5. B was born in an odd-numbered year. B is older than G. The sum of the present ages of F and C is 68. F is younger than C. H is not the youngest.

54. Four of the following five are alike in a certain way as per the given arrangement and hence form a group. Which of the following does not belong to the group?

- 1)E 2)B 3)C 4)F 5)G

55. How many persons are younger than E?

- 1) Two 2) More than three
 3) None 4) Three
 5) One

56. Who amongst the following was born in the year 1996?
 1)E 2)C 3)A 4)G 5) None of these

57. If A's uncle is 21 years older than A, then how old is A's uncle at present (in years)?

- 1)77 2)68 3)89 4)64 5)55

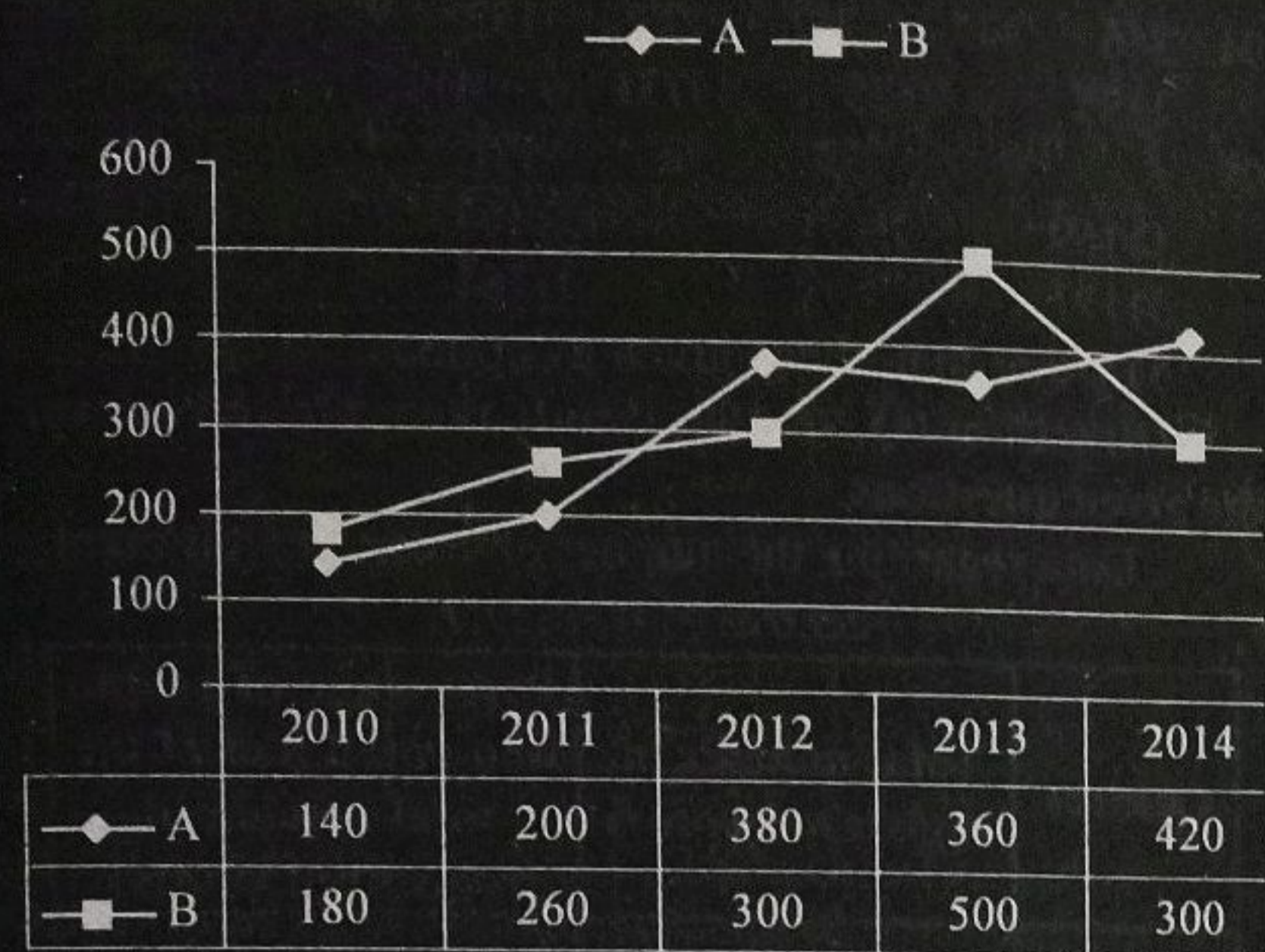
58. Which of the following represents the difference between the present ages of B and H (in years)?

- 1)22 2)9 3)25 4)32 5)13

59. In the number 7853921, one is added to each digit exactly divisible by two. Two is subtracted from each

Directions (Q. 71-75): Refer to the graph and answer the given questions.

Number of students who opted for 2 courses A and B from 2010 to 2014



71. The number of students who opted for Course B in 2013 was what per cent more than that who opted for course A in 2013?

- 1) $45\frac{1}{6}$ 2) $42\frac{4}{9}$ 3) $38\frac{8}{9}$
 4) $56\frac{7}{9}$ 5) $62\frac{1}{9}$

72. What is the difference between the total number of students who opted for Courses A and B together in 2012 and that who opted for both the courses together in 2014?

- 1) 50 2) 30 3) 60
 4) 40 5) None of these

73. In 2014, if 'X' students passed Courses A and B each and the ratio of the number of students who failed in Courses A and B respectively was 5 : 2, what is the value of 'X'?

- 1) 190 2) 220 3) 160 4) 150 5) 180

74. What is the average number of students who opted for Course A in 2010, 2011 and 2012?

- 1) 225 2) 250 3) 230 4) 240 5) 260

75. The number of students who opted for Courses A and B in 2011 was respectively 25% more and 35% less than that in 2009. What was the total number of students who opted for Courses A and B together in 2009?

- 1) 600 2) 540 3) 575 4) 560 5) 650

76. The ratio of the numerical values of curved surface area to the volume of the right circular cylinder is 1 : 7. If the ratio of the diameter to the height of the cylinder is 7 : 5, then what is the total surface area of the cylinder? (in m^2)

- 1) 2992 2) 3172 3) 2882 4) 3576 5) 3992

77. The time taken by a boat to cover a distance of 'D-56' km upstream is half of that taken by it to cover a distance of 'D' km downstream. The ratio of the speed of the boat downstream to that upstream is 5 : 3. If the time taken to cover 'D-32' km upstream is 4 hours, what is the speed of water current? (in km/h)

- 1) 5 2) 3 3) 4
 4) 16 5) 8

78. Poona invests ₹4200 in Scheme A, which offers 12% pa simple interest. She also invests ₹(4200 - P) in scheme B offering 10% pa compound interest (compounded annually). The difference between the interests Poona earned from both the schemes at the end of 2 years is ₹294. What is the value of P?

- 1) 1500 2) 800
 3) 600 4) 1000

5) Other than those given as options

79. A man sold two articles - A (at a profit of 40%) and B (at a loss of 20%). He earned a total profit of ₹8 in the whole deal. If article A costs ₹140 less than article B, what is the price of article B?

- 1) ₹380 2) ₹280 3) ₹340
 4) ₹375 5) ₹300

80. B is eighteen years younger than A. The ratio of B's age six years hence to C's present age is 3 : 2. If at present A's age is twice the age of C, then what was B's age four years ago?

- 1) 24 years 2) 28 years 3) 26 years
 4) 20 years 5) 16 years

81. The time taken by A alone to finish a piece of work is 60% more than that taken by A and B together to finish the same piece of work. C is twice as efficient as B. If B and C together can complete the same piece of work in

$13\frac{1}{3}$ days, in how many days can A alone finish the same piece of work?

- 1) 32 2) 24
 3) 16 4) 28
 5) Other than those given as options

82. Out of her monthly salary, Ridhi spends 34% on various expenses. From the remaining, she gives $\frac{1}{6}$ th

to her brother, $\frac{2}{3}$ to her sister and the remaining she

keeps as savings. If the difference between the amounts she gave to her sister and brother was ₹10,560, what was Ridhi's savings?

- 1) ₹3,740 2) ₹3,420
 3) ₹4,230 4) ₹3,230
 5) Other than those given as options

83. A bag contains 63 cards (numbered 1, 2, 3, ... 63). Two cards are picked at random from the bag (one after another and without replacement). What is the

probability that the sum of the numbers of both the cards drawn is even?

- 1) $\frac{11}{21}$ 2) $\frac{34}{63}$
 3) $\frac{7}{11}$ 4) $\frac{11}{63}$

5) Other than those given as options

84. A, B and C started a business and invested in the ratio of 3 : 4 : 5. After 4 months A withdrew $\frac{1}{12}$ of the amount of what B and C had invested. If the annual income was ₹9200 then what was the share of B?

- 1) ₹4200 2) ₹3800 3) ₹3600
 4) ₹2800 5) Other than the given options

Directions (Q. 85-89): In each question, two equations numbered I and II are given. You have to solve both the equations and mark the appropriate answer.

85. I. $3x^2 - 4x + 1 = 0$ II. $15y^2 - 8y + 1 = 0$

- 1) $x > y$ 2) $x \leq y$
 3) $x = y$ or relation can't be established
 4) $x \geq y$ 5) $x < y$

86. I. $x^2 + 14x + 45 = 0$ II. $y^2 + 19y + 88 = 0$

- 1) $x \geq y$ 2) $x < y$
 3) $x \leq y$
 4) $x = y$ or relation can't be established
 5) $x > y$

87. I. $x^2 - 2x - 8 = 0$ II. $y^2 + 15y + 54 = 0$

- 1) $x = y$ or relation can't be established
 2) $x \leq y$ 3) $x > y$
 4) $x \geq y$ 5) $x < y$

88. I. $2x^2 - 9x + 9 = 0$ II. $y^2 - 7y + 12 = 0$

- 1) $x < y$ 2) $x \leq y$
 3) $x > y$
 4) $x = y$ or relation can't be established
 5) $x \geq y$

89. I. $x^2 = 121$ II. $y^2 - 23y + 132 = 0$

- 1) $x > y$ 2) $x \geq y$
 3) $x < y$ 4) $x \leq y$
 5) $x = y$ or relation can't be established

90. A jar contains a mixture of milk and water in the ratio of 3 : 1. Now, $\frac{1}{25}$ of the mixture is taken out and 24 litres

water is added to it. If the resultant ratio of milk to water in the jar was 2 : 1, what was the initial quantity of mixture in the jar? (in litres)

- 1) 160 2) 180 3) 200
 4) 250 5) Other than the given options

Directions (Q. 91-95): What will come in place of question mark (?) in the given number series?

91. 17 9 10 16.5 ? 90
 1) 44 2) 35 3) 48 4) 38 5) 33

92. 7 6 10 27 ? 515
 1) 112 2) 104 3) 114 4) 96 5) 108
 93. 33 40 29 42 25 ?
 1) 40 2) 44 3) 52 4) 48 5) 46
 94. 316 307 282 233 152 ?
 1) 35 2) 25 3) 31 4) 41 5) 47
 95. 5 9 33 72 121 ?
 1) 169 2) 163
 3) 171 4) 184
 5) Other than those given as options

Directions (Q. 96-100): Study the table and answer the given questions.

Data regarding the number of voters at 5 different centres A, B, C, D, E

Centres	Total number of registered voters	Percentage of people who voted (out of the total number of registered voters)
A	2100	80
B	1700	80
C	3000	70
D	2400	76
E	2000	85

96. What is the average number of people who voted at centres B, D and E?
 1) 1700 2) 1628 3) 1720 4) 1740 5) 1560
97. What per cent of the total number of registered voters cast invalid votes at Centre D, if the number of invalid votes cast at Centre D was 10% of the number of votes cast?
 1) 5.5 2) 8.5
 3) 7.6 4) 6.5
 5) Other than those given as options
98. At Centre F, the total number of registered voters was 25% less than that at Centre C. At Centre F, the number of people who voted was 450 less than that at Centre C and 150 votes cast were declared invalid. What was the ratio of the number of valid votes cast to the total number of registered voters at centre F?
 1) 4 : 5 2) 3 : 4 3) 2 : 3 4) 6 : 1 5) 5 : 8
99. The number of people who did not vote at Centre D was what per cent more than that who did not vote at Centre A?
 1) $42\frac{6}{7}$ 2) $35\frac{2}{3}$
 3) $37\frac{1}{7}$ 4) $43\frac{5}{8}$
 5) Other than those given as options
100. What is the difference between the total number of people who did not vote at Centres A and B together and that who did not vote at Centres D and E together?
 1) 80 2) 60 3) 50 4) 70 5) 116