





C. 784

D. 867

18  **$\sqrt{5T84-V3249-7}$**

A. 15

B. 25

C. 35

D. 45

19  **$3\sqrt{32768}=?$**

A. 26

B. 28

C. 32

D. 34

20  **$17.5\%$  of 860 = 13.5 +?**

A. 131

B. 133

C. 141

D. 137

21  **$147/? = ?/48$**

A. 84

B. 86

C. 88

D. 92

22  **$24/7$  of  $3/8$  of  $1/2$  of 1568 =?**

A. 166

B. 168

C. 172

D. 174

23  **$\sqrt{9025} \div \sqrt{361} = 175. ?$**

A. 30

B. 33

C. 35

D. 37

24  **$8.4 \times 5.6 \div ? = 19.6$**

A. 1.8

B. 2.4

C. 2.8

D. 3.2

25  **$18635 - 12377 + 3271 = ?$**

A. 9529

B. 9343

C. 9671

D. 9279

26 Direction (Q. 1 - 10) : What value should come in place of question mark (?) in the following equations ?

**$(704 \times 555) \div 55 = ?$**

A. 7428

B. 7364

C. 7212

D. 7104

27  **$(t \times 4)^2 - (17)^2 = ?$**

A. 463

B. 644

C. 784

D. 867

28 **V5T84-V3249 -7**

- A. 15  
 C. 35

- B. 25  
 D. 45

29  **$3\sqrt{32768} = ?$**

- A. 26  
 C. 32

- B. 28  
 D. 34

30 **17.5% of 860 = 13.5 + ?**

- A. 131  
 C. 141

- B. 133  
 D. 137

31 **147/? = ?/48**

- A. 84  
 C. 88

- B. 86  
 D. 92

32  **$4/7$  of  $3/8$  of  $1/2$  of 1568 = ?**

- A. 166  
 C. 172

- B. 168  
 D. 174

33  **$\sqrt{9025} \div \sqrt{361} = 175. ?$**

- A. 30  
 C. 35

- B. 33  
 D. 37

34  **$8.4 \times 5.6 \div ? = 19.6$**

- A. 1.8  
 C. 2.8

- B. 2.4  
 D. 3.2

35 **18635 - 12377 + 3271 = ?**

- A. 9529  
 C. 9671

- B. 9343  
 D. 9279

## REASONING ABILITY

1Direction (Q. 6 - 10): In each question below is given a group of letters followed by a few combinations of symbols and digits numbered (1), (2), (3) and (4). You have to find out which of the combinations correctly represents the group of letters, following the codes and conditions as the answer. If none of the four combinations correctly represents the group of letters, mark (4), ie None of these, as the answer.

Letter: P D W I F H N U E R T A K M B

Digit/symbol : 4\* 3 \$ # 1 @ 2 8 9 6. © 5 % 7

Conditions:

(i) If the first letter is a vowel and the last letter is a consonant, both are to be coded as the code for the vowel.

(ii) If the first letter is a consonant and the last letter is a vowel, the codes for these two are to be interchanged.  
 (iii) If both the first and the last letters are consonants, both are to be coded as the code for the last letter. Now, based on the above, find out the coded form of the letter groups given in each question.

**Q. FWNEDR**

- A. 93@8\*9
- B. 93@8\*#
- C. #3@8\*#
- D. #3@8\*9

**2Q. ABUHFI**

- A. ©217#\$
- B. ©721#©
- C. \$721#\$
- D. ©721#\$

**3Q. FPTWHU**

- A. #4631#
- B. #46312
- C. #46312
- D. 246312

**4Q. AMPNWR**

- A. ©%4@39
- B. ©%4@3©
- C. ©%4@36
- D. 9%4@39

**5 Q. MTABRW**

- A. 36©79%
- B. %6©79%
- C. %6©793
- D. None of these

6. Direction (Q. 1 - 10) : In each of the questions below, which of the five Answer Figures on the right should come after the Problem Figures, if the sequence were continued ?

**Problem Figures**

O Z	C Z C Δ	P ★ # Z
C S	O Δ P Z	C Z C ★

**Answer Figures**

C Z	C Z	# Z	C Z	Z C
# S	# ψ	C ψ	# P	ψ #
1	2	3	4	5

- A. Answer Figure 1
- B. Answer Figure 2
- C. Answer Figure 3
- D. Answer Figure 4

**7. Problem Figures**

O	Z	=	★	O	Z	ψ	∞	O	Z
C	=	Z	O	★	ψ	Z	O	∞	Q

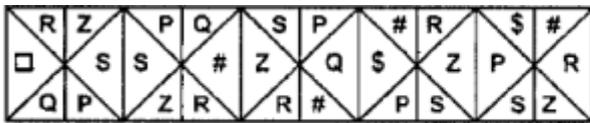
**Answer Figures**

\$	∞	O	#	Q	\$	O	\$	Q	\$
O	Z	Z	Q	∞	O	Z	Q	Z	O
1	2	3	4	5					

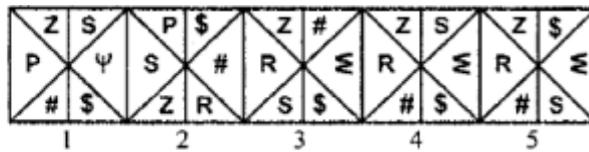
- A. Answer Figure 2
- C. Answer Figure 4

- B. Answer Figure 3
- D. Answer Figure 5

8. **Problem Figures**



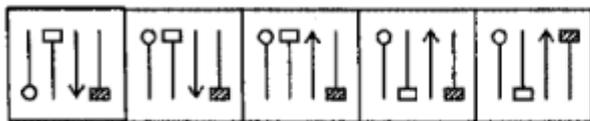
**Answer Figures**



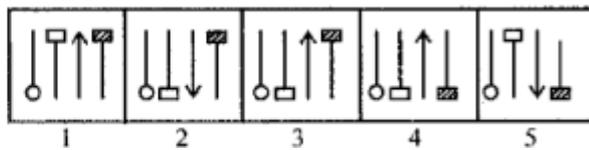
- A. Answer Figure 1
- C. Answer Figure 3

- B. Answer Figure 2
- D. Answer Figure 4

9. **Problem Figures**



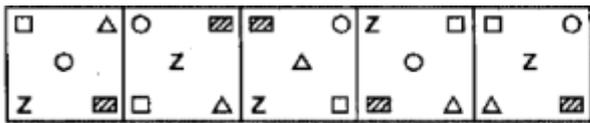
**Answer Figures**



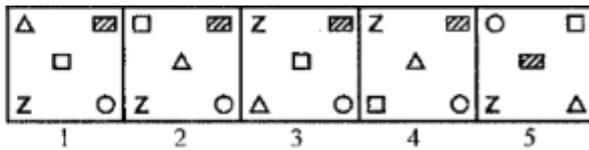
- A. Answer Figure 1
- C. Answer Figure 3

- B. Answer Figure 2
- D. Answer Figure 4

10. **Problem Figures**



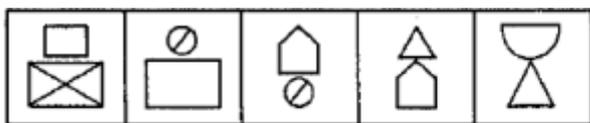
**Answer Figures**



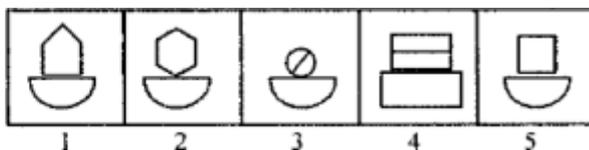
- A. Answer Figure 1
- C. Answer Figure 3

- B. Answer Figure 2
- D. Answer Figure 4

11. **Problem Figures**



**Answer Figures**



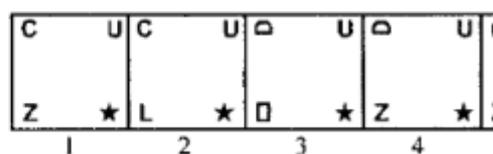
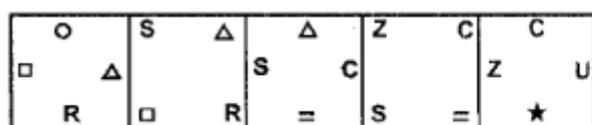
- A. Answer Figure 1
- C. Answer Figure 3

- B. Answer Figure 2
- D. Answer Figure 4

12. **Problem Figures**

**Figures**

**Answer**



- A. Answer Figure 1

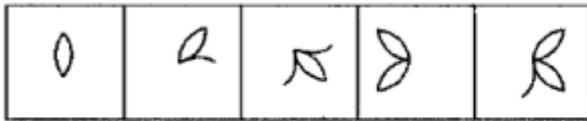
- B. Answer Figure 2

C. Answer Figure 3

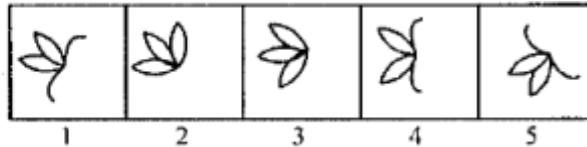
D. Answer Figure 4

13

**Problem Figures**



**Answer Figures**



A. Answer Figure 1

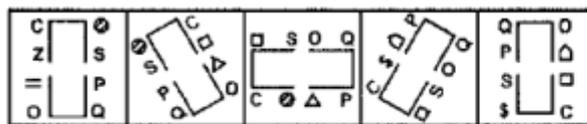
B. Answer Figure 2

C. Answer Figure 3

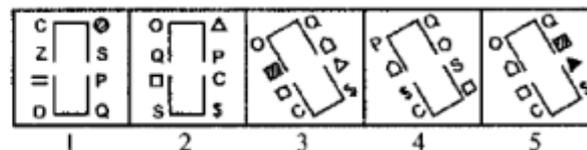
D. Answer Figure 4

14

**Problem Figures**



**Answer Figures**



A. Answer Figure 2

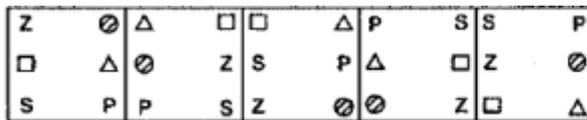
B. Answer Figure 3

C. Answer Figure 4

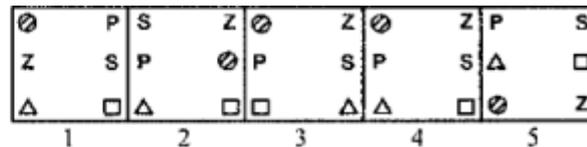
D. Answer Figure 5

15

**Problem Figures**



**Answer Figures**



A. Answer Figure 1

B. Answer Figure 2

C. Answer Figure 3

D. Answer Figure 4

16 How many such pairs of letters are there in the word **PREVIOUS** each of which has as many letters between them in the word as in the English Alphabet?

A. none

B. one

C. two

D. three

17 How many such digits are there in the number **96258431** each of which is as far away from the beginning of the number as when the digits are arranged in descending order within the number?

A. none

B. one

C. two

D. three

18 Four of the following five are alike in a certain way and so form a group. Which is the one that does not belong to that group?

A. NQ

B. DA

C. JM

D. FJ



27 How many such symbols are there in the above arrangement each of which is immediately preceded by a letter and also immediately followed by a number?

- A. none  B. one  
 C. two  D. three

28 Four of the following are alike in a certain way based on their positions in the above arrangement and so form a group. Which is the one that does not belong to that group?

- A. B7D  B. 46?  
 C. 9N+  D. 5#M

29 Which of the following is the fifth to left of the ninth from the right end of the above arrangement?

- A. \$  B. N  
 C. B  D. 8

30 How many such symbols are there in the above arrangement each of which is immediately preceded by a number and also immediately followed by a letter?

- A. three  B. one  
 C. none  D. two

31 Direction (Q. 6 - 10) : Study the following information carefully to answer these questions.

Eight persons A, B, C, D, E, F, G and H are sitting around a circle facing the centre. A is not the neighbour of E. C is third to the right of B. H is second to left of E, who is next to the right of C. F is not, neighbour of E or B, and is to the immediate left of G.

Which of the following is the correct position of C?

- A. To the immediate right of E  B. To the immediate right of H  
 C. To the immediate left of A  D. To the immediate left of H

32 Who is to the immediate right of B?

- A. A  B. G  
 C. H  D. Cannot be determined

33 Which of the following pairs of persons represents F's neighbors?

- A. D and E  B. G and B  
 C. G and D  D. B and D

34 Which of the following groups has the first person sitting between the other two persons?

- A. GBA  B. AHC  
 C. CDE  D. None of these

35 Who is to the immediate left of F?

- A. G  B. B  
 C. E  D. D

## ENGLISH LANGUAGE

1 Direction (Q. 1 - 10) : In each of the following sentences there are two blanks. Below each sentence there are five pairs of words denoted by the numbers 1), 2), 3) and 4). Find out which pair of words can be filled up in the blanks in the sentence in the same sequence to make it meaningfully complete.

**It was not \_\_\_\_\_ but a search for excitement which made him steal \_\_\_\_\_ the shop.**

- |   |   |
|---|---|
| <input type="checkbox"/> A. money, into     | <input type="checkbox"/> B. necessary, at |
| <input type="checkbox"/> C. necessity, from | <input type="checkbox"/> D. required, in  |

**2 The rank and \_\_\_\_\_ of the party had turned \_\_\_\_\_ the leader.**

- |   |   |
|---|---|
| <input type="checkbox"/> A. file, against | <input type="checkbox"/> B. cadre, on   |
| <input type="checkbox"/> C. office, for   | <input type="checkbox"/> D. rankers, to |

**3 Before his \_\_\_\_\_ cross-examination his alibi fell \_\_\_\_\_.**

- |  |  |
|--|--|
| <input type="checkbox"/> A. illegal, short | <input type="checkbox"/> B. legal, off   |
| <input type="checkbox"/> C. separate, down | <input type="checkbox"/> D. shrewd, flat |

**4 We thought that the Sadhu had \_\_\_\_\_ powers, but we soon found that we were \_\_\_\_\_.**

- |   |  |
|---|--|
| <input type="checkbox"/> A. super, fault  | <input type="checkbox"/> B. natural, wronged     |
| <input type="checkbox"/> C. extra, deceit | <input type="checkbox"/> D. miraculous, deceived |

**5 Salaries could not be \_\_\_\_\_ because the chairman \_\_\_\_\_ not signed the cheques.**

- |  |   |
|--|---|
| <input type="checkbox"/> A. paid, was  | <input type="checkbox"/> B. disbursed, had  |
| <input type="checkbox"/> C. given, did | <input type="checkbox"/> D. released, could |

**6 After \_\_\_\_\_ caught in the act, he knew that he was in \_\_\_\_\_ trouble.**

- |   |  |
|---|--|
| <input type="checkbox"/> A. when, intense | <input type="checkbox"/> B. been, dreaded    |
| <input type="checkbox"/> C. being, dire   | <input type="checkbox"/> D. become, intended |

**7 Martin was \_\_\_\_\_ to the Police station because he was drunk and \_\_\_\_\_.**

- |   |   |
|---|---|
| <input type="checkbox"/> A. fetched, sleepy | <input type="checkbox"/> B. bought, nasty       |
| <input type="checkbox"/> C. being, rough    | <input type="checkbox"/> D. brought, disorderly |

**8 At times, when she was in the right \_\_\_\_\_, she would \_\_\_\_\_ a humour which no one could match.**

- |   |   |
|---|---|
| <input type="checkbox"/> A. position, develop | <input type="checkbox"/> B. mood, display |
| <input type="checkbox"/> C. frame, cause      | <input type="checkbox"/> D. brain, create |

**9 Few could \_\_\_\_\_ her mental \_\_\_\_\_ when her husband died.**

- |  |  |
|--|--|
| <input type="checkbox"/> A. know, feelings | <input type="checkbox"/> B. feel, thoughts |
|--|--|

- C. understand, anguish                       D. see, health

10 **Illiteracy** \_\_\_\_\_ a great \_\_\_\_\_ to progress.

- A. being, recession                       B. isnt, obstruct  
 C. now, distraction                       D. is, impediment

11 Direction (Q. 1 - 10) : In the following passage, there are blanks, each of which has been numbered. These numbers are printed below the passage and against each, four words are suggested, one of which fits the blank appropriately. Find out the appropriate word in each case. Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(1). 1) of 2) for 3) at 4) in**

- A. of     B. for  
 C. at     D. in

12 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(2). 1) hold 2) had 3) held 4) did**

- A. hold     B. had  
 C. held     D. did

13 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(3). 1) took 2) discussed 3) looked at 4) taken**

- A. took     B. discussed  
 C. looked at                                       D. taken

14 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(4). 1) advice 2) suggest 3) offered 4) suggested**

- A. advice     B. suggest  
 C. offered     D. suggested

15 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(5). 1) can 2) will 3) shall 4) could**

- |                                   |                                   |
|-----------------------------------|-----------------------------------|
| <input type="checkbox"/> A. can   | <input type="checkbox"/> B. will  |
| <input type="checkbox"/> C. shall | <input type="checkbox"/> D. could |

16 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(6). 1) wanted 2) wished 3) desired 4) enquired**

- |                                     |                                      |
|-------------------------------------|--------------------------------------|
| <input type="checkbox"/> A. wanted  | <input type="checkbox"/> B. wished   |
| <input type="checkbox"/> C. desired | <input type="checkbox"/> D. enquired |

17 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(7). 1) be 2) was 3) would 4) could**

- |                                   |                                   |
|-----------------------------------|-----------------------------------|
| <input type="checkbox"/> A. be    | <input type="checkbox"/> B. was   |
| <input type="checkbox"/> C. would | <input type="checkbox"/> D. could |

18 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(8). 1) few 2) little 3) some 4) much**

- |                                  |                                    |
|----------------------------------|------------------------------------|
| <input type="checkbox"/> A. few  | <input type="checkbox"/> B. little |
| <input type="checkbox"/> C. some | <input type="checkbox"/> D. much   |

19 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(9). 1) can 2) could 3) should 4) would**

- |                                    |                                   |
|------------------------------------|-----------------------------------|
| <input type="checkbox"/> A. can    | <input type="checkbox"/> B. could |
| <input type="checkbox"/> C. should | <input type="checkbox"/> D. would |

20 Yesterday, a senior officer (1) police (2) a meeting with the residents of the area and (3) security measures. He (4) some measures which, if taken, (5) make their houses more secure. In the meeting, the residents (6) if it (7) possible for the police to register a (8) security agencies who (9) provide trained security guards to them. He (10) to the proposal.

**(10). 1) agreeing 2) confirmed 3) accepted 4) agreed**

- |                                      |                                       |
|--------------------------------------|---------------------------------------|
| <input type="checkbox"/> A. agreeing | <input type="checkbox"/> B. confirmed |
| <input type="checkbox"/> C. accepted | <input type="checkbox"/> D. agreed    |

21 Direction (Q. 1 - 10) : Read the following passage carefully and answer the questions given below it. "Personally I am always ready to learn. Although I do not always like being taught," said Sir Winston Churchill. This comes to my mind when I think of the impact of teachers on students. There are vast and unimaginable differences in teacher-student relationship today as compared to what it was fifty years ago. Today, the teacher's profession seems to be meant only to teach and not to take any corrective measure or action in order to shape the minds or mould students. It is not the fault of the teachers as their hands are tied and their role is confined to teaching. Parents do not realise the importance of the role of a teacher. The days are changed for worse. The word 'impact' has three connotations, viz effect, impulse and coercion. A good teacher can be a great analyst who can make students understand and study well. A teacher's intelligence helps a school achieve good results. He also fosters excellence among students. The other connotation is impulse, which means force, inspiration and motivation. In the present world, the teacher is prohibited from using force. He can announce some incentives for those students who score high grades and prizes can be given. Thus, teachers can indirectly motivate students to perform better. Compulsion/coercion refers to penal measures to impart education. They may create a violent impact. Penal measures had been effective half a century ago but now it has become out dated, as corporal punishment is banned.

**What is the focal point of the passage?**

- |  |   |
|--|---|
| <input type="checkbox"/> A. Education system             | <input type="checkbox"/> B. Moral values among teachers |
| <input type="checkbox"/> C. Teacher-student relationship | <input type="checkbox"/> D. All the above               |

22 **According to the author,**

**(A) teachers are alone" responsible for the present condition of students.**

**(B) Students are themselves responsible for their present condition.**

**(C) Parents are also responsible for the present development in teacher-student relationship.**

- |  |  |
|--|--|
| <input type="checkbox"/> A. Only (A) is true | <input type="checkbox"/> B. Only (B) is true |
| <input type="checkbox"/> C. Only (C) is true | <input type="checkbox"/> D. All are true     |

23 **Which of the following statements is/are correct in the context of the passage?**

**(1) Now, teachers don't perform their duties honestly.**

**(2) Teachers don't want to take corrective measures.**

**(3) Teachers' hands are bound and they cannot take any coercive measure.**

- |  |  |
|--|--|
| <input type="checkbox"/> A. Only (1) is true | <input type="checkbox"/> B. Only (2) is true |
| <input type="checkbox"/> C. Only (3) is true | <input type="checkbox"/> D. All are true     |

24 **What are the three connotations of impact?**

- |   |   |
|---|---|
| <input type="checkbox"/> A. Reading, writing and meditation | <input type="checkbox"/> B. Effect, impulse and coercion          |
| <input type="checkbox"/> C. Thought, action and perfection  | <input type="checkbox"/> D. Sincerity, punctuality and discipline |

25 **Teachers can't take any coercive measures because**

- |   |  |
|---|--|
| <input type="checkbox"/> A. parents dont want it to be enacted. | <input type="checkbox"/> B. students get agitated. |
| <input type="checkbox"/> C. corporal punishments are banned.    | <input type="checkbox"/> D. All the above          |

26 **When had the penal measures been effective?**

- |  |  |
|--|--|
| <input type="checkbox"/> A. Never        | <input type="checkbox"/> B. Half a century ago |
| <input type="checkbox"/> C. A decade ago | <input type="checkbox"/> D. Always             |

27 **'Coercive' measures may have**

- |   |  |
|---|--|
| <input type="checkbox"/> <b>A.</b> positive impact      | <input type="checkbox"/> <b>B.</b> corrective impact |
| <input type="checkbox"/> <b>C.</b> revolutionary impact | <input type="checkbox"/> <b>D.</b> violent impact    |

28 **Teachers are indirectly motivating students by**

- |   |  |
|---|--|
| <input type="checkbox"/> <b>A.</b> moral teachings    | <input type="checkbox"/> <b>B.</b> punishment    |
| <input type="checkbox"/> <b>C.</b> encouraging morals | <input type="checkbox"/> <b>D.</b> None of these |

29 Direction: Read the following passage carefully and answer the questions given below it.

"Personally I am always ready to learn. Although I do not always like being taught," said Sir Winston Churchill. This comes to my mind when I think of the impact of teachers on students. There are vast and unimaginable differences in teacher-student relationship today as compared to what it was fifty years ago. Today, the teacher's profession seems to be meant only to teach and not to take any corrective measure or action in order to shape the minds or mould students. It is not the fault of the teachers as their hands are tied and their role is confined to teaching. Parents do not realise the importance of the role of a teacher. The days are changed for worse. The word 'impact' has three connotations, viz effect, impulse and coercion. A good teacher can be a great analyst who can make students understand and study well. A teacher's intelligence helps a school achieve good results. He also fosters excellence among students. The other connotation is impulse, which means force, inspiration and motivation. In the present world, the teacher is prohibited from using force. He can announce some incentives for those students who score high grades and prizes can be given. Thus, teachers can indirectly motivate students to perform better. Compulsion/coercion refers to penal measures to impart education. They may create a violent impact. Penal measures had been effective half a century ago but now it has become out dated, as corporal punishment is banned.

Direction (Q. 9 - 10) : Choose the word which is most nearly the SAME in meaning as the word printed in bold as used in the passage.

**Q. Connotation**

- |   |  |
|---|--|
| <input type="checkbox"/> <b>A.</b> Compulsion | <input type="checkbox"/> <b>B.</b> Impact        |
| <input type="checkbox"/> <b>C.</b> Pressure   | <input type="checkbox"/> <b>D.</b> None of these |

30 **Q. Corporal**

- |   |  |
|---|--|
| <input type="checkbox"/> <b>A.</b> Physical | <input type="checkbox"/> <b>B.</b> Psychological |
| <input type="checkbox"/> <b>C.</b> Mental   | <input type="checkbox"/> <b>D.</b> Capital       |

## ANSWERS

	NA	RA	ENG
1	C	A	C
2	C	D	A
3	B	B	D
4	C	B	D
5	A	D	B
6	C	B	C
7	D	D	D
8	D	D	B
9	B	A	C
10	D	D	D
11	C	B	A
12	B	B	C
13	A	A	B
14	D	D	D
15	D	D	D
16	D	A	D
17	D	D	B
18	A	D	A
19	C	C	B
20	D	C	D
21	A	B	C
22	B	D	C
23	C	A	C
24	B	D	B
25	A	C	C
26	D	A	B
27	D	C	C

- 28    A        D        D  
 29    C        B        D  
 30    D        D        A  
 31    A        B  
 32    B        A  
 33    C        C  
 34    B        D  
 35    A        D

## EXPLANATIONS

1

**Answer** : Option C

**Explanation** :

$$\text{Repairing cost} = 420 \times 25/100 = 525$$

$$\text{Selling price} = 525 + 126 = 651$$

$$\therefore \% \text{ rise} = 651 - 420/420 \times 100 = 55\%$$

2

**Answer** : Option C

**Explanation** :

Let his score in Maths be  $x$  and that in Physics be  $y$ .

$$\therefore 4x/5 = 4y/3$$

$$\text{or } 3x = 5y$$

$$x + y = 120$$

$$= 3x + 3y = 360$$

$$= 8y = 360 \qquad \therefore y = 360/8 = 45$$

3

**Answer** : Option B

**Explanation** :

$$268400 = P \times 18 \times 8/100 + P = 61P/25$$

$$\therefore P = 25 \times 268400/61 = 110000$$

4

**Answer** : Option C

**Explanation :**

Let the total distance be x

$$\therefore 2x/3 = 40 \times 5 + 30 \times 20 = 800$$

$$\therefore x = 1200$$

$$\therefore \text{Remaining distance} = 1200 - 800 = 400 \text{ km}$$

$$\therefore \text{Speed} = 400/8 = 50 \text{ km-1}$$

5

**Answer :** Option A

**Explanation :**

$$\text{Population} = 400000 \times 115/100 \times 115/100 \times 115/100 = 608350$$

6

**Answer :** Option C

**Explanation :**

$$683815.5/5000000 = (r + r/100)^3$$

$$\therefore 1 + r/100 = \sqrt[3]{683815.5/5000000}$$

$$= \sqrt[3]{1367631/1000000} = \sqrt[3]{(111/100)^3}$$

$$\therefore 1 + r/100 = 111/100 = r/100 = 111/100 - 1 = 11/100$$

$$\therefore r = 11\%$$

7

**Answer :** Option D

**Explanation :**

$$\text{Principal} = 4 \times 100 \times 100/5 \times 5 = 1600$$

8

**Answer :** Option D

**Explanation :**

$$\text{No. of students who failed} = (100 - 35)$$

$$= 65\% \text{ of } 1400 = 65/100 \times 1400 = 910$$

9

**Answer :** Option B

**Explanation :**

Let the original fraction be x/y.

$$\therefore x + x \times 200/100/y + y \times 400/100 = 3/8 \qquad = 3x/5y = 3/8$$

$$\therefore x/y = 5/8$$

10

**Answer :** Option D

**Explanation :**

The amount after two years

$$= 1000 \times 111/100 \times 111/100 = 12321$$

$$\therefore \text{CI} = 12321 - 10000 = 2321$$

11

**Answer** : Option C

**Explanation** :

Let the total number of cows be  $x$  and that of hens be  $y$

$$\therefore x + y = 84$$

$$4x + 2y = 256$$

$$\therefore 2x + y = 128$$

From (i) and (ii),

$$x = 44, y = 40$$

12

**Answer** : Option B

**Explanation** :

Let the cost of a pen be  $x$  and that of a copy be  $y$

$$\therefore 24x + 40y = 520 \quad \dots\dots(i)$$

Multiplying (i) by  $7/4$  we get

$$24x \times 7/4 + 40y \times 7/4 = 520 \times 7/4$$

$$= 42x + 70y = 910$$

13

**Answer** : Option A

**Explanation** :

$$\text{Total cost} = 5200 \times 48$$

$$\therefore \text{Booking cost} = (5200 \times 48) \times 17/100 = 42432$$

14

**Answer** : Option D

**Explanation** :

$$32\% \text{ of } x = 250 + 22 = 272$$

$$\therefore x = 272 \times 100/32 = 850$$

15

**Answer** : Option D

**Explanation** :

Let the total distance be  $x$  km

$$x/4 + x/3 = 1.4 = 7/5$$

$$\text{or } 7x/12 = 7/5 \quad \therefore x = 12/5 = 2.4 \text{ km}$$

**Answer** : Option **D**  
**Explanation** :  
**No Explanation**  
16

**Answer** : Option **D**  
**Explanation** :  
**No Explanation**  
17

**Answer** : Option **A**  
**Explanation** :  
**No Explanation**  
18

**Answer** : Option **C**  
**Explanation** :  
**No Explanation**  
19

**Answer** : Option **D**  
**Explanation** :  
**No Explanation**  
20

**Answer** : Option **A**  
**Explanation** :  
**No Explanation**  
21

**Answer** : Option **B**  
**Explanation** :  
**No Explanation**  
22

**Answer** : Option **C**  
**Explanation** :  
**No Explanation**  
23

**Answer** : Option **B**  
**Explanation** :  
**No Explanation**  
24

**Answer** : Option **A**  
**Explanation** :  
**No Explanation**  
25

**Answer** : Option **D**  
**Explanation** :

**No Explanation**  
27

**Answer** : Option **D**

**Explanation** :

**No Explanation**  
28

**Answer** : Option **A**

**Explanation** :

**No Explanation**  
29

**Answer** : Option **C**

**Explanation** :

**No Explanation**  
30

**Answer** : Option **D**

**Explanation** :

**No Explanation**  
31

**Answer** : Option **A**

**Explanation** :

**No Explanation**  
32

**Answer** : Option **B**

**Explanation** :

**No Explanation**  
33

**Answer** : Option **C**

**Explanation** :

**No Explanation**  
34

**Answer** : Option **B**

**Explanation** :

**No Explanation**  
35

**Answer** : Option **A**

**Explanation** :

**No Explanation**

## REASONING

1

**Answer** : Option **A**

**Explanation** :

**condition (iii) applies**

2

**Answer** : Option **D**

**Explanation :**  
no condition applies

3

**Answer :** Option B

**Explanation :**  
condition (ii) applies

4

**Answer :** Option B

**Explanation :**  
condition (i) applies

5

**Answer :** Option D

**Explanation :**  
condition (iii) applies and we get 36@793

6

**Answer :** Option B

**Explanation :**  
In the first step, the elements of upper-left and lower-left are interchanged and a new elements is added at lower right. In the next step, the elements of upper-right and lower-right are interchanged and a new elements is added at lower left.

7

**Answer :** Option D

**Explanation :**  
No Explanation

8

**Answer :** Option D

**Explanation :**  
In the first step, every elements is interchanged with its opposite element and a new element is added at middle right. In the next step, each elements moves CW.

9

**Answer :** Option A

**Explanation :**  
No Explanation

10

**Answer :** Option D

**Explanation :**  
No Explanation

11

**Answer :** Option B

**Explanation :**  
In each step, upper elements becomes the lower elements for the next step.

12 **Answer :** Option D **Explanation :**

In each step the elements shift half a side ACW with one elements is replaced by a new one.

13

**Answer :** Option A  
**Explanation :**  
**No Explanation**  
 14

**Answer :** Option D  
**Explanation :**  
**No Explanation**  
 15

**Answer :** Option D  
**Explanation :**  
**No Explanation**  
 16

**Answer :** Option A  
**Explanation :**  
**No Explanation**  
 17

**Answer :** Option D  
**Explanation :**  
**after arrangement**

9 6 2 5 8 4 3 1

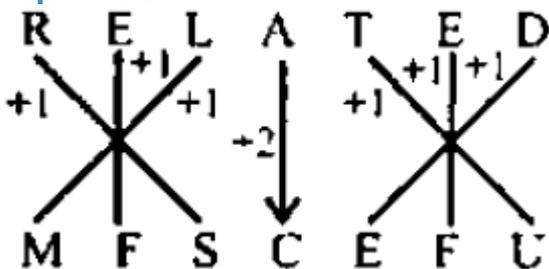
9 8 6 5 4 3 2 1  
 18

**Answer :** Option D  
**Explanation :**  
**In all others, there is a gap of two letters.**  
 19

**Answer :** Option C  
**Explanation :**  
**DALE, DEAL, LEAD**  
 20

**Answer :** Option C  
**Explanation :**  
**All others are prime numbers.**  
 21

**Answer :** Option B  
**Explanation :**



22

**Answer** : Option **D**

**Explanation** :

$$20 + 40 = 60 \text{ m}$$

23

**Answer** : Option **A**

**Explanation** :

Man's son's sister = Man's daughter  
Man's daughter is the mother of woman's husband.

24

**Answer** : Option **D**

**Explanation** :

247 = good little boy .....(i)

258 = tall big boy .....(ii)

791 = beautiful little girl .....(iii)

From (i) and (iii) little = 7 .....(iv)

From (i) and (ii) boy = 2 .....(v)

Using (iv) and (v) in (i), we get: good = 4

25

**Answer** : Option **C**

**Explanation** :

Vivek's rank = 8th

∴ Suryash's rank =  $(8 + 5 = )$ 13th

∴ Suryash's rank from the bottom =  $(40 - 13 + 1 = )$ 28th.

26

**Answer** : Option **A**

**Explanation** :

4th to the left of 20th from left =  $(20 - 4 = )$ 16th from left = 5

27

**Answer** : Option **C**

**Explanation** :

W\*2, F@3

28

**Answer** : Option **D**

**Explanation** :

On all others,

1st elements + 2 = 2nd elements and 1st elements + 1 = 3rd element.

29

**Answer** : Option **B**

**Explanation** :

5th to the left of 9th from right =  $(9 + 5 = )$ 14th from right

30

**Answer** : Option **D**  
**Explanation** :  
**9+N, 5#M**  
31

**Answer** : Option **B**  
**Explanation** :  
**No Explanation**  
32

**Answer** : Option **A**  
**Explanation** :  
**No Explanation**  
33

**Answer** : Option **C**  
**Explanation** :  
**No Explanation**  
34

**Answer** : Option **D**  
**Explanation** :  
**No Explanation**  
35

**Answer** : Option **D**  
**Explanation** :  
**No Explanation**