



रेल भर्ती बोर्ड / RAILWAY RECRUITMENT BOARDS
सी ई एन - ०१/२०२५ - CEN - 01/2025
सहायक लोको पायलट की भर्ती/ Recruitment of Assistant Loco Pilot



Test Date	17/02/2026
Test Time	12:30 PM - 1:30 PM
Subject	RRB ALP CBT 1

* Note

Correct Answer will carry 1 mark per Question.

Incorrect Answer will carry 1/3 Negative mark per Question.

1. Options shown in green color with a tick icon are correct.

2. Chosen option on the right of the question indicates the option selected by the candidate.

Section : RRB ALP

Q.1 A car travels 120 km at 60 km/h, then 200 km at 80 km/h, but during the second segment, it experiences a total stoppage time of 20 minutes due to traffic. After that, it covers the final 150 km at 100 km/h. What is the average speed (in km/h, rounded off to one decimal place) of the car for the entire journey including stoppage times?

- Ans A. 74.2
 B. 75.3
 C. 73.5
 D. 72.4

Q.2 Megaphones, loudhailers, horns and musical instruments like trumpets and shehnais are designed to:

- Ans A. Absorb sound waves
 B. Send sound in a specific direction
 C. Spread sound equally in all directions
 D. Reduce the loudness of sound

Q.3 A question is followed by two statements numbered (I) and (II). You have to decide whether the data provided in the statements are sufficient to answer the question. Read both the statements and decide the appropriate answer.

Q. Four bags – Atlas, Bolt, Cargo, and Drift – have different weights.

Which bag is heavier: Bolt or Cargo?

(I) Atlas is heavier than Bolt but lighter than Drift.

(II) Cargo is lighter than Drift but heavier than Atlas.

- Ans A. Data in Statement II alone is sufficient to answer the question while data in Statement I is not
 B. Data in both statements I and II together are NOT sufficient to answer the question
 C. Data in both statements I and II together (and not statement I alone or statement II alone) are sufficient to answer the question
 D. Data in Statement I alone is sufficient to answer the question while data in Statement II is not

Q.4 Paritosh starts from Point A and drives 22 km towards South. He then takes a right turn, drives 12 km, turns right and drives 26 km. He then takes a right turn and drives 23 km. He takes a final right turn, drives 4 km and stops at Point P. How far (shortest distance) and towards which direction should he drive in order to reach Point A again? (All turns are 90-degree turns only, unless specified.)

- Ans A. 11 km to the east
 B. 10 km to the west
 C. 11 km to the west
 D. 10 km to the east

Q.5 What should come in place of ? in the given series?

91 97 106 118 133 ?

- Ans
- A. 150
 - B. 152
 - C. 151
 - D. 153

Q.6 Select the set in which the numbers are related in the same way as are the numbers of the following sets.

(NOTE : Operations should be performed on the whole numbers, without breaking down the numbers into its constituent digits. E.g. 13 – Operations on 13 such as adding / subtracting /multiplying etc. to 13 can be performed. Breaking down 13 into 1 and 3 and then performing mathematical operations on 1 and 3 is not allowed)

(8,168,7)

(9,243,9)

- Ans
- A. (12,252,7)
 - B. (16,324,8)
 - C. (15,330,8)
 - D. (13,325,9)

Q.7 Refer to the following letter series and answer the question that follows. Counting to be done from left to right only.

(Left) F U V G Q R T N E S C T E U S R R S Q Q Y (Right)

How many such vowels are there, each of which is immediately preceded by a consonant and also immediately followed by a consonant?

- Ans
- A. One
 - B. More than three
 - C. Two
 - D. None

Q.8 This question is based on the five, three-digit numbers given below.

(Left) 567 254 395 486 671 (Right)

(Example- 697 – First digit = 6, second digit = 9 and third digit = 7)

What will be the resultant if the third digit of the highest number is added to the third digit of the lowest number?

- Ans
- A. 4
 - B. 3
 - C. 5
 - D. 2

Q.9 What should come in place of the question mark (?) in the given series based on the English alphabetical order?

MCZ RHE WMJ BRO ?

- Ans
- A. GTW
 - B. GRD
 - C. GWT
 - D. GER

Q.10 If $m:f = 16:3$, then what is the value of $\frac{3m - 16f}{3m + 16f}$?

Ans A. 0

B. $\frac{233}{249}$

C. $\frac{253}{247}$

D. $\frac{253}{249}$

Q.11 The length of a side of a square is equal to the diameter of a circle. If the area of the square is equal to 196cm^2 , then find the area of the circle (in cm^2). (Use $\pi = \frac{22}{7}$)

Ans A. 154

B. 148

C. 616

D. 145

Q.12 D, E, F, G, I, J and K are sitting around a circular table, facing the centre of the table. E sits to the immediate left of I. F sits to the immediate left of D. D sits second to the left of K. G sits third to the left of I. Who sits third to the right of J?

Ans A. G

B. K

C. D

D. F

Q.13 Refer to the following letter, symbol series and answer the question that follows. Counting to be done from left to right only. (Left) # P & T £ @ G \$ G V M & X M @ # & L L @ K Y (Right) How many such letter are there, each of which is immediately preceded by a symbol and also immediately followed by a symbol?

Ans A. 3

B. 4

C. 5

D. 2

Q.14 A shopkeeper sells an item for ₹430.5 after giving two successive discounts of 70% and 75% on its marked price. Had he not given any discount, he would have earned a profit of 40%. What is the cost price (in ₹) of the item?

Ans A. 4,121

B. 4,145

C. 4,100

D. 4,081

Q.15 Select the pair which follows the same pattern as that followed by the two set of pairs given below. Both pairs follow the same pattern.

NLGT : SPJV

DQCL : IUFN

Ans A. JPZS : OTCU

B. WXYZ : BBBC

C. KNMS : PRPV

D. RMEF : WRHH

Q.16 Each vowel in the word JOURNAL is changed to the letter immediately following it in the English alphabetical order and each consonant is changed to the letter immediately preceding it in the English alphabetical order. How many vowels are there in the new group of letters thus formed?

- Ans A. 1
 B. 0
 C. 3
 D. 2

Q.17 A product's price after successive discounts of 20% and 10% is ₹7,200. What was the original price of the product before any discounts were applied?

- Ans A. ₹9,000
 B. ₹12,000
 C. ₹10,000
 D. ₹11,000

Q.18 What is the mode of the following data?

77, 85, 87, 75, 78, 62, 68, 61, 90, 63, 61, 71, 69, 77, 75, 82, 75, 69, 74, 75, 70, 81, 65, 66, 61

- Ans A. 75
 B. 77
 C. 61
 D. 69

Q.19 The distance between the pole and the principal focus of a spherical mirror is called:

- Ans A. Focal length
 B. Magnification
 C. Radius of curvature
 D. Aperture

Q.20 4% of a number is what percentage of 20% of the same number?

- Ans A. 500%
 B. 16.67%
 C. 8.33%
 D. 20%

Q.21 In the following number-pairs, the second number is obtained by applying certain mathematical operation(s) to the first number. Which numbers should replace X and Y, so that the pattern followed by the two numbers on the left side of :: is the same as that on the right side of ::?

(NOTE: Operations should be performed on the whole numbers, without breaking down the numbers into their constituent digits. E.g. 13 – Operations on 13 such as adding to/subtracting from/multiplying with 13 can be performed. Breaking down 13 into 1 and 3 and then performing mathematical operations on 1 and 3 is not allowed.)

X : 98 :: 196 : Y

- Ans A. X = 116, Y = 178
 B. X = 104, Y = 185
 C. X = 47, Y = 101
 D. X = 98, Y = 96

Q.22 Vinay starts to walk from point A towards the south for 7 m. Then he takes a left turn and walks for 8 m. Then he takes a left turn and walks for 4 m. Then he takes a left turn and walks for 2 m. Then he takes a right turn and walks for 3 m. At last, he takes left turn and walks for 2 m and stops at point B. Towards which direction should he walk in order to reach point A again? (All turns are 90-degree turns only unless specified.)

- Ans
- A. North
 - B. South
 - C. East
 - D. West

Q.23 What should come in place of the question mark (?) in the given series based on the English alphabetical order?

ZHW UCR PXM KSH ?

- Ans
- A. FCD
 - B. FNC
 - C. FCN
 - D. FDR

Q.24 Based on the English alphabetical order, three of the following four letter-cluster pairs are alike in a certain way and thus form a group. Which letter-cluster pair DOES NOT belong to that group? (Note: The odd one out is not based on the number of consonants/vowels or their position in the letter-cluster.)

- Ans
- A. JI-LK
 - B. BA-DC
 - C. GH-PQ
 - D. XW-ZY

Q.25 Five students, P, Q, R, S, and T, have different heights. P is taller than Q but shorter than R. S is not the shortest. Only one student is shorter than T. Who among them is the shortest?

- Ans
- A. P
 - B. R
 - C. Q
 - D. S

Q.26 Each of A, B, C, D, E, F and G play a game on a different day of a week starting from Monday and ending on Sunday of the same week. B plays the game on Wednesday. Only three persons play between B and F. Only one person plays between C and F. A plays immediately before D. G does not play immediately after B. On which day does A play the game?

- Ans
- A. Tuesday
 - B. Sunday
 - C. Friday
 - D. Monday

Q.27 What will come in place of the question mark (?) in the following equation, if '+' and '÷' are interchanged and '-' and 'x' are interchanged?

$$312 + 6 \times 8 - 21 \div 169 = ?$$

- Ans
- A. 51
 - B. 59
 - C. 55
 - D. 53

Q.28 In a certain code language,

'A # B' means 'A is the daughter of B',
'A @ B' means 'A is the brother of B',
'A + B' means 'A is the wife of B' and
'A - B' means 'A is the father of B'.

Based on the above, how is D related to R if 'D # M - S + P @ R'?

- Ans
- A. Brother's daughter
 - B. Brother's wife's mother
 - C. Brother's wife's sister
 - D. Brother's wife

Q.29 A question is followed by two statements numbered (I) and (II). You have to decide whether the data provided in the statements are sufficient to answer the question. Read both the statements and decide the appropriate answer.

Q. Four people – Amit, Bhavesh, Chandan, and Dhiraj – are of different ages.
Who is the oldest?

(I) Bhavesh is older than Amit but younger than Dhiraj.

(II) Chandan is younger than Dhiraj but older than Amit.

- Ans
- A. Data in both statements I and II together (and not statement I alone or statement II alone) are sufficient to answer the question
 - B. Data in Statement I alone is sufficient to answer the question while data in Statement II is not
 - C. Data in Statement II alone is sufficient to answer the question while data in Statement I is not
 - D. Data in both statements I and II together are NOT sufficient to answer the question

Q.30 If $a^2 + b^2 + c^2 + 189 = 6(a + 4b + 2c)$, then $\sqrt{ab + bc + ca}$ is equal to:

- Ans
- A. $2\sqrt{14}$
 - B. $2\sqrt{11}$
 - C. $3\sqrt{11}$
 - D. $3\sqrt{14}$

Q.31 It is given that, $\triangle ABC \sim \triangle EDF$ such that $AB = 5$ cm, $AC = 7.5$ cm, $DF = 15$ cm and $ED = 12.5$ cm. The sum of the remaining sides of the triangles is:

- Ans
- A. 24.75 cm
 - B. 22.25 cm
 - C. 20.25 cm
 - D. 23.25 cm

Q.32 Anand purchased an item and spent ₹63 on its repair. He then sold it to Bharath at a profit of 25%. Later, Bharath sold the item for ₹8415, incurring a loss of 15%. What was Anand's cost (in ₹) of the item just before selling it to Bharath?

- Ans
- A. 7917
 - B. 7918
 - C. 7920
 - D. 7919

Q.33 In a certain code language,
'A # B' means 'A is the daughter of B',
'A % B' means 'A is the father of B',
'A - B' means 'A is the son of B',
'A @ B' means 'A is the sister of B'.

How is S related to U if 'S @ M - H # Y % U'?

- Ans A. Sister's daughter
 B. Brother's daughter
 C. Daughter
 D. Sister

Q.34 Bharat, Jyoti, and Vishal invest ₹70,000, ₹32,000, and ₹46,000, respectively, to start a business. At the end of the year, the total profit earned is ₹52,540. 60% of the total profit earned is given to charity and the rest is divided among them in the ratio of their profit. What will be the share of Vishal (in ₹)?

- Ans A. 6,380
 B. 6,532
 C. 6,520
 D. 6,453

Q.35 What will come in the place of '?' in the following equation, if '+' and '-' are interchanged and 'x' and '÷' are interchanged?

$$5 \times 39 \div 39 + 39 - 5 = ?$$

- Ans A. -29
 B. -27
 C. -31
 D. -30

Q.36 If the cost price of 12 identical books is ₹960 and the cost price of 8 identical pens is ₹320, find the total cost price (in ₹) of 15 books and 10 pens of the same kind.

- Ans A. 1800
 B. 1600
 C. 1200
 D. 1500

Q.37 Read the given statement(s) and conclusions carefully. Assuming that the information given in the statements is true, even if it appears to be at variance with commonly known facts, decide which of the given conclusions logically follow(s) from the statement(s).

Statements:

Some buttons are mangoes.
Some pigs are mangoes.

Conclusions:

(I) Some buttons are pigs.
(II) All mangoes are buttons.

- Ans A. Both conclusions (I) and (II) follow.
 B. Neither conclusion (I) nor (II) follows.
 C. Only conclusion (I) follows.
 D. Only conclusion (II) follows.

Q.38 The mean of a data is four times of its mode. If the median of the data is 63, find its mean.

- Ans A. 63
 B. 72
 C. 93
 D. 84

Q.39 A student's marks were incorrectly entered as 44 instead of 92. Due to this, the average marks of the class got decreased by $\frac{4}{3}$. What is the number of students in the class?

- Ans**
- A. 43
 - B. 32
 - C. 36
 - D. 41

Q.40 Which of the following processes is responsible for the transportation of soluble products formed by photosynthesis in different parts of plant?

- Ans**
- A. Transpiration
 - B. Assimilation
 - C. Termination
 - D. Translocation

Q.41 NQMI is related to TWSO in a certain way based on the English alphabetical order. In the same way, DHKF is related to JNQL. To which of the following is LOPS related, following the same logic?

- Ans**
- A. QUUX
 - B. RUVY
 - C. RVUY
 - D. QVVX

Q.42 Three pipes of diameters 2 cm, 3 cm and 4 cm are running together to fill a cistern. The smallest pipe alone can fill the cistern in 232 minutes. The amount of water flowing in each pipe is proportional to the square of its diameter. The time (in minutes) taken by all pipes running together to completely fill the cistern is:

- Ans**
- A. 40
 - B. 42
 - C. 32
 - D. 36

Q.43 In a certain code language, 'book is published' is coded as 'cw ku qr' and 'book was interesting' is coded as 'ot qr zx'. How is 'book' coded in the given language?

- Ans**
- A. ot
 - B. qr
 - C. cw
 - D. ku

Q.44 The cost of 7 kg of sugar of quality A is ₹245, and the cost of 5 kg of sugar of quality B is ₹300. In what ratio should quality A sugar and quality B sugar be mixed so that the cost of 1 kg of the mixture is ₹50?

- Ans**
- A. 3 : 4
 - B. 2 : 3
 - C. 3 : 2
 - D. 4 : 3

Q.45 Refer to the following letter, symbol series and answer the question that follows.
Counting to be done from left to right only.
(Left) K Ω T & R \$ S @ B * L % N # P £ D Ω G \$ M (Right)
How many such letters are there, each of which is immediately preceded by a symbol and also immediately followed by another symbol?

- Ans**
- A. One
 - B. Three
 - C. More than three
 - D. Two

Q.46 What should come in place of the question mark (?) in the given series?
25 29 34 40 47 55 ?

- Ans
- A. 62
 - B. 68
 - C. 66
 - D. 64

Q.47 A person drove at 59 kmph for 3.5 hours, then increased his speed by 9 kmph, and reached the destination in another hour. Find the average speed (in kmph) of the person during the entire journey.

- Ans
- A. 61
 - B. 57
 - C. 59
 - D. 66

Q.48 Oaths and affirmations for various constitutional posts are provided in which Schedule of the Indian Constitution?

- Ans
- A. Eleventh Schedule
 - B. First Schedule
 - C. Third Schedule
 - D. Ninth Schedule

Q.49 In 2025, which Indian state unveiled plans to establish the country's first Quantum Computing Village?

- Ans
- A. Tamil Nadu
 - B. Kerala
 - C. Andhra Pradesh
 - D. Haryana

Q.50 In a code language, 'SAND' is coded as WDRG and 'BIRD' is coded as FLVG. How will 'FOUR' be coded in the same language?

- Ans
- A. JSXV
 - B. JRYU
 - C. IRYW
 - D. ISXV

Q.51 Seven people, A, B, C, D, E, F and G, are sitting in a row, facing north. No one sits to the right of E. Only three people sit between E and D. Only two people sit between D and A. F sits third to the left of B. G sits to the immediate right of B. How many people sit between B and E?

- Ans
- A. 3
 - B. 2
 - C. 1
 - D. 4

Q.52 Based on the English alphabetical order, three of the following four letter-cluster pairs are alike in a certain way and thus form a group. Which letter-cluster pair DOES NOT belong to that group?

(Note: The odd one out is not based on the number of consonants/vowels or their position in the letter-cluster.)

- Ans
- A. PN - QO
 - B. RP - BJ
 - C. MK - NL
 - D. FD - GE

Q.53 Each letter in the word SHOCKED is changed to the letter immediately preceding it in the English alphabetical order and then all the letters thus obtained are arranged in the English alphabetical order. Which of the following letters will be second from the right in the new group of letters thus formed?

- Ans A. D
 B. N
 C. G
 D. J

Q.54 In a division sum, the divisor is 2 times the quotient and 4 times the remainder. If the remainder is 22, what is the dividend?

- Ans A. 3894
 B. 3892
 C. 3899
 D. 3889

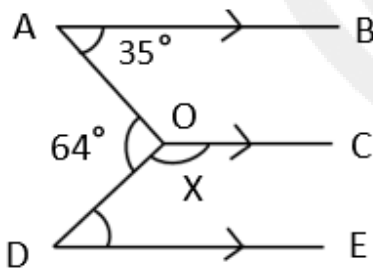
Q.55 The price of an article was ₹1600, It increased by 10% in the first year and by 20% in the second year. What is the price (in ₹) of the article after two years?

- Ans A. 2000
 B. 2144
 C. 1840
 D. 2112

Q.56 Each of Gauri, Hina, Isha, Jack, Kunti, Lali and Mahima has an exam on a different day of a week starting from Monday and ending on Sunday of the same week. Gauri has an exam on Monday. Only three persons have exams between Gauri and Kunti. Hina has exam immediately after Jack and Hina has exam immediately before Isha. Lali does not have an exam on the last day. On which day does Lali have the exam?

- Ans A. Sunday
 B. Wednesday
 C. Saturday
 D. Tuesday

Q.57 In the given figure, find the value of x .



- Ans A. 105°
 B. 145°
 C. 209°
 D. 151°

Q.58 A cistern can be filled by a tap in 5 hours and emptied by an outlet pipe in 9 hours. How long will it take to fill the cistern if both the tap and the pipe are opened together?

- Ans A. 11 hours 25 minutes
 B. 11 hours 15 minutes
 C. 12 hours 15 minutes
 D. 12 hours 25 minutes

Q.59 For an echo to be heard clearly, the reflecting surface should be at least how far from the listener? (Take speed of sound ≈ 340 m/s)

- Ans
- A. 50 m
 - B. 17 m
 - C. 100 m
 - D. 34 m

Q.60 During a sale 50% of the goods are sold at 40% profit, 30% of the remaining goods are sold at 46% profit and the still remaining goods are sold at a loss of 24%. If there is an overall profit of $x\%$, then what is the value of x ?

- Ans
- A. 18.5
 - B. 17.5
 - C. 19
 - D. 20

Q.61 A solid metal sphere is melted and smaller spheres of equal radii are formed. 5% of the volume of the sphere is lost during the process. The smaller sphere has a radius that is one-tenth of the large sphere. If 14 liters of paint was needed to paint the larger sphere, how many liters is needed to paint all the smaller spheres?

- Ans
- A. 154 liters
 - B. 102 liters
 - C. 133 liters
 - D. 44 liters

Q.62 Seven boxes, M, N, O, P, Q, R and S, are kept one over the other but not necessarily in the same order. P is kept third from the bottom. Only one box is kept between P and M but M is not kept in the lowermost position. Only three boxes are kept between M and R. O is kept immediately below Q. Only one box is kept between O and N. Which box is second from the top?

- Ans
- A. O
 - B. N
 - C. Q
 - D. R

Q.63 If 'P' stands for ' \times ', 'Q' stands for ' $+$ ', 'R' stands for ' $-$ ' and 'S' stands for ' \div ', then what will come in place of the question mark (?) in the following equation?

$$70 \text{ Q } 2 \text{ R } 5 \text{ P } 3 \text{ S } 18 = ?$$

- Ans
- A. 48
 - B. 38
 - C. 21
 - D. 54

Q.64 If the energy of an electron in the second orbit of hydrogen is -3.4 eV, what is the energy in the fourth orbit?

- Ans
- A. -1.7 eV
 - B. -6.8 eV
 - C. -13.6 eV
 - D. -0.85 eV

Q.65 PL 2 is related to LO 15 in a certain way. In the same way, NJ 5 is related to JM 18. To which of the given options is NP 3 related, following the same logic?

- Ans
- A. IT 14
 - B. JT 14
 - C. JS 16
 - D. IS 16

Q.66 The cilia in the upper respiratory tract primarily help in:

- Ans
- A. Absorbing oxygen
 - B. Gas exchange
 - C. Pumping blood to lungs
 - D. Removing harmful particles from inhaled air

Q.67 Why do we feel cool after applying water on our skin in summer?

- Ans
- A. Evaporation of water absorbs heat from the skin surface
 - B. Water reduces sweat formation and retains body heat
 - C. Water increases body temperature by absorbing sunlight
 - D. Condensation of water releases energy on the skin surface

Q.68 Read the given statements and conclusions carefully. Assuming that the information given in the statements is true, even if it appears to be at variance with commonly known facts, decide which of the given conclusions logically follow(s) from the statements.

Statements:

No rugs are lamps.
No doors are rugs.

Conclusions:

(I) No doors are lamps.
(II) Some lamps are doors.

- Ans
- A. Only conclusion (II) follows.
 - B. Only conclusion (I) follows.
 - C. Both conclusions (I) and (II) follow.
 - D. Neither conclusion (I) nor (II) follows.

Q.69 Atul distributed ₹24700 between his two grandsons 12-year-old Baban and 13-year-old Rakesh such that they get equal money when they turn 23 years old. Till then the money is in a bank getting compound interest at 8% per annum, compounded annually. How much (in ₹) Atul deposited in the name of Rakesh?

- Ans
- A. 12825
 - B. 11625
 - C. 13175
 - D. 11875

Q.70 What sum (in ₹) will earn an interest of ₹480 in 2 years at 12% simple interest per year?

- Ans
- A. 2200
 - B. 1800
 - C. 2000
 - D. 2150

Q.71 In the following number-pairs, the second number is obtained by applying certain mathematical operations to the first number. Select the set in which the numbers are related in the same way as are the numbers of the following sets.
(NOTE : Operations should be performed on the whole numbers, without breaking down the numbers into its constituent digits. E.g. 13 – Operations on 13 such as adding / subtracting / multiplying etc. to 13 can be performed. Breaking down 13 into 1 and 3 and then performing mathematical operations on 1 and 3 is not allowed.)

112 - 100
34 - 22

- Ans
- A. 55 - 42
 - B. 15 - 3
 - C. 23 - 12
 - D. 43 - 23

Q.72 On the basis of function, the plasma membrane is _____ in nature.

- Ans
- A. semi-permeable
 - B. selectively permeable
 - C. fully permeable
 - D. fully non-permeable

Q.73 A, B, D, U, P and K live on six different floors of the same building. The lowermost floor in the building is numbered 1, the floor above it is numbered 2 and so on till the topmost floor is numbered 6. U lives on an odd-numbered floor but not on the lowermost floor. Only one person lives between U and P. D does not live on the lowermost floor. K lives immediately above D. B lives immediately above U. A lives immediately below U. Who lives on Floor 2?

- Ans
- A. A
 - B. P
 - C. U
 - D. B

Q.74 Based on the English alphabetical order, three of the following four letter-clusters are alike in a certain way and thus form a group. Which letter-cluster DOES NOT belong to that group? (Note: The odd one out is not based on the number of consonants/vowels or their position in the letter-cluster.)

- Ans
- A. CVR
 - B. OID
 - C. GAV
 - D. JDY

Q.75 Each letter in the word BANNER is changed to the letter immediately preceding it in the English alphabetical order, and then all the letters thus formed are arranged in reverse alphabetical order. Which letter will be third letter from the right in the new number thus formed?

- Ans
- A. C
 - B. M
 - C. B
 - D. L