5. CODING AND DECODING

In these questions, a particular code is given and on the basis of this given code, we have to find out how another word (in English language) can be coded. The correct code for the given word has to be selected from the answer choices on the basis of the code given in the question.

The questions can be classified into two categories:
1. Replacement   **2. Re-arrangement**

Examples:

1. In a certain code language, if the word 'PARTNER' is coded as OZQSMDQ, then what is the code for the word 'BUSINESS' in that language?

Sol. This is a Replacement question.
Word : P A R T N E R
Logic : -1 -1 -1 -1 -1 -1 -1
Code : O Z Q S M D Q

Similarly the code for BUSINESS is
Word : B U S I N E S S
Logic : -1 -1 -1 -1 -1 -1 -1 -1
Code : A T R H M D R R

Ans: **ATRHMDRR**

2. In a certain code language, if the word REASONING' is coded as TGCUQPKPI, then how is the word 'NUMARACY' coded in that language?

Sol. This is a Replacement question.
Word : R E A S O N I N G
Logic : +2 +2 +2 +2 +2 +2 +2 +2 +2
Code : T G C U Q P K P I

Similarly, the code for NUMARACY is
Word : N U M A R A C Y
Logic : +2 +2 +2 +2 +2 +2 +2 +2
Code: P W O C T C E A

ANS: **PWOCTCEA**

3. In a certain code language, if the word 'SPHERE' is coded as EREHPS, then how is the word 'CIRCLE' coded in that language?

Sol. This is a Re-arrangement question.
Word: S P H E R E
Logic: The letters in the given word are reversed.
Code: E R E H P S
Similarly, the code for CIRCLE, is
Word: C I R C L E
Logic: The letters in the given word are reversed.
Code: E L C R I C

4. In a certain code language, if the word 'REJECTION' is coded as SGMIHZPWW, then how is the word 'APPROVAL' coded in that language?

Sol. This is a Replacement question.
Word: R E J E C T I O N
Logic: +1 +2 +3 +4 +5 +6 +7 +8 +9
Code: S G M I H Z P W W
Similarly, the code for MECHANIC is
Word: A P P R O V A L
Logic: +1 +2 +3 +4 +5 +6 +7 +8
Code: B R S V T B H T

BRSVTBHT

5. In a certain code language, if the word 'PLAYER' is coded as AELPRY, then how is the word 'ENGINEER' coded?

Sol. This is a Re-arrangement question.
Word: P L A Y E R
Logic: The letters in the word are arranged in the increasing order of their value as in the alphabet.
Code: A E L P R Y
Similarly, the code for ENGINEER is EEEGINNR.

6. In a certain code language, if the number 1 is assigned to all the letters in odd numbered places in the alphabet and the remaining letters are assigned the number 2, then what is the code for the word 'POLITICIAN'?

Sol. The code for the word POLITICIAN is 2121211112.

7. If BUS = 84, TRAIN = 124, then RIKSHAW =?
Sol: B + U + S = 42, 42 * 2 = 84
T + R + A + I + N = 62, 62 * 2 = 124
So, R + I + K + S + H + A + W = 89, 89 * 2 = 178

8. In a certain code if white is called as black, black as yellow, yellow as blue, blue as red, red as green, green as orange, then what is the colour of milk in that language?

Sol. The colour of milk is white and in this code white is called Black. Hence, milk is Black in colour in that language.

Exercise

Directions for questions 1 to 30: Select the correct alternative from the given choices.

1. In a certain code language, if the word DECODING is coded as GNIDOCED, then how is the word LANGUAGE coded in that language?
(1) LNAGUAGE   (2) NANGUGAE
(3) EGAUGNAL   (4) GEAUGNAL

2. In a certain code language, if the word ENVIRONMENT is coded as EVRNETNIOMN, then how is the word HAPPINESS coded in that language?
(1) HPIESPANS　　(2) HPIESAPNS
(3) HPEISAPNS　　(4) HPISEAPNS

3. In a certain code language, if the word CIRCUMFERENCE is coded as IRUFNECCMEREC, then how is the word SENTIMENT coded in that language?
(1) ENIESTNTM　　(2) ENIESMTNT
(3) ENIESTMNT　　(4) ENEISTMNT

4. In a certain code language, if the word REGISTRATION is coded as TSIGERNOITAR, then how is the word RESERVATIONS coded in that language?
(1) VRESERSNOITA　　(2) ERESRSNOITVA
(3) VRESERNOITAS　　(4) VRESERSNIOTA

5. In a certain code language, if the word COMPUTER is coded as OCPMTURE, then how is the word HYGROMETER coded in that language?
(1) YHRGMOTREE　　(2) YHRGMTOERE
(3) YHRGMOTERE　　(4) YHRMGOTERE

6. In a certain code language, if the word CUSTOMER is coded as RCEUMSOT, then how is the word BUILDING coded in that language?
(1) BGUNIILD　　(2) GBNUIIDL
(3) GBNUIILD　　(4) GBNIUIDL

7. In a certain code language, if the word DESKTOP is coded as EFTLUPQ, then how is the word COMPUTER coded in that language?
(1) DPNQWUFS　　(2) DPNQVUF
(3) DPNQVUFS　　(4) DNPQUVFS

8. In a certain code language, if the word STRUCTURE is coded as TVUYHZBZN, then how is the word TABLE coded in that language?
(1) UCEPJ　　(2) UCEOJ
(3)UCEQJ　　(4) UCEPK

9. In a certain code language, if the word MAJESTY is coded as NZKDTSZ, then which word is coded as GNVMEDS in that language?
(1) FLOWERS　　(2) FLYOVER
(3) FOUNDER　　(4) FLIPPER

10. In a certain code language if the word BOTTLE is coded as DRYAWR, then what is coded as MISCHIEF?
(1) KFNVWVNM　　(2) OLXYJSVVY
(3) OLXIRVWY　　(4) KFNWVWNM

1I. In a certain code language, if the word MINUTE is coded as NMWKSO, then what is the code for the word SECOND?
(1) TILFNM　　(2) TLIEMN
(3) TJLEMN　　(4) TILEMN

12. In a certain code language if the word CHAIR is coded as FPBRJ, then how is the word PENCIL coded in that language?
(1) FJCFRX　　(2) EPFBRF
(3) FJBFRX　　(4) DJBFRW

13. In a certain code language, if MOUSE is coded as NMXOJ, then what is coded as NMFEQY?
(1) MOBILE　　(2) MOCILF
(3) MNBHLE　　(4) MOCILE

14. In a certain code language, if the word SERVICE is coded as FDJWSFT, then how is the word FURNISH coded in that language?
(1) ITJOSVG　　(2) ITJORWG
(3) ITKNSVG　　(4) ITHNRVG

15. In a certain code language if the word CYCLE is coded as XBXOV, then how is the word SHIRT coded in that language?
(1) HSRIG　　(2) HSRIT
(3) HSIRG　　(4) HISGR

16. In a certain code language, if the word CENTRAL is coded as FBQQUXO, then how is the word FLOWER coded in that language?
(1) IOLZBU　　(2) IIRTHX
(3) IIRTHO　　(4) IILZHV

17. In a certain code language, if the word MATERIALS is coded as DSZLRTMBJ, then how is the word REASONING coded in that language?
(1) RZDQOHOJO　　(2) PFBTOOJOH
(3) HOJOOQDZR　　(4) RZDQOOJOH

18. In a certain code language, if the word ADMINISTRATIVE is coded as AADEIIIMNRSTTV, then how is the word ADVENTURE coded in that language?
(1) AEUEDVNTR　　(2) ADEENRTUV
(3) AEUEDNTVR　　(4) AEEUDNRTV

19. In a certain code language, if DIGITAL = 49 and BREAKING = 64, then MARVELLOUS =?
(1) 81　　(2) 75　　(3) 90　　(4) 100

20. In a certain code language, if CABLE = 50 and BEAUTY = 60, then COSMETIC =?
(1) 70　　(2) 80　　(3) 90　　(4) 100

21. In a certain code language, if INDIA = 37 and NEPAL = 48, then CHINA =?
(1) 36　　(2) 38　　(3) 44　　(4) 35

22. In a certain code language, if BUS = 126 and GIRL = 184, then TIGER =?
(1) 285   (2) 295   (3) 280   (4) 265

23. In a certain code language, if RADIO = 74 and VISUAL = 48, then CINEMA =?
(1) 54   (2) 45   (3) 64   (4) 34

24. In a certain code language, if GROUP = 82 and HURDLE = 74, then RAILWAY =?
(1) 89   (2) 95   (3) 97   (4) 96

Directions for questions 25 to 29: These questions are based on the following data.

In a certain code language, if the word COMFORT is coded as FMZDDPN and the word TRAINERS is coded as NPBGBCJQ, then how the following words are coded in that language?

25. BOTTLE
(1) DMNRXC   (2) DMNRXD
(3) DMMRXC   (4) DNNRXC

26. HISTORY
(1) FGLRDPX   (2) PGLRDNW
(3) FRQNMKW   (4) PGLRDPX

27. ELEPHANT
(1) JXJNPYBR   (2) JJJNPBYR
(3) JJJNPYBR   (4) JXJPNYRB

28. COMPUTER
(1) FMZNPJRP   (2) FMZNPRJP
(3) ANKFSNCJ   (4) FZMMPRPJ

29. PAPER
(1) FYFCJ   (2) NBNJP
(3) FYEJP   (4) FYFDK

Directions for questions 30 to 32: Select the correct alternative from the given choices.

30. In a certain code language, if Violet is called as Green, Green is called as Red, Red is called as Brown, Brown is called as Orange, Orange is called as Yellow, Yellow is called as Blue and Blue is called as Indigo, then what is the colour of sky in that language?
(1) Red   (2) Blue
(3) Green   (4) Indigo

31. In a certain code language, the letters in the English alphabet are coded as follows, based on their place values. Each letter with a multiple of 2 as place value are given 1 as code, and the ones with a multiple of 3 as place value are given 2 as code, in case of a clash, 1 prevails and the rest of the letters

are given 3 as code. Then what is the code for the word EDUCATION?
(1) 312231221   (2) 312131321
(3) 312231211   (4) 312232121

32. In a certain code language, if each letter in the English alphabet, with an odd numbered value is given a code of 1 and each of the remaining letters is coded as 2, then what is the code for the word MECHANIZATION?
(1) 1112121212212   (2) 1122121212212
(3) 1112121212112   (4) 1121121212112

Directions for questions 33 to 37: For the following groups of letters given in Column I, the codes are given in Column II. Answer the following questions by finding the codes for the groups from the given columns.

	Column I				Column II			
(1)	lat	cat	bat	dat	a	b	p	d
(2)	fat	gat	mat	cat	t	d	s	c
(3)	rat	bat	gat	tat	x	p	c	w
(4)	nat	dat	fat	rat	b	s	x	j

33. What is the code for lat?
(1) c   (2) b   (3) p   (4) a

34. What is the code for tat?
(1) w   (2) x   (3) p   (4) c

35. What is the code for rat?
(1) j   (2) s   (3) b   (4) x

36. What is the code for nat?
(1) x   (2) s   (3) j   (4) b

37. What is the code for cat?
(1) b   (2) p   (3) x   (4) d

Directions for questions 38 to 42: For the words given in column I, the codes are given in Column II. Answer the following questions by finding the codes for the letters from the words and their codes given in the columns.

	Column I	Column II
(1)	AREJEND	@#96@0&
(2)	COBBON	615715
(3)	HOUSE	@*2&1
(4)	SUAAORJ	#*21&#9
(5)	DRUB	5*0&

38. What is the code for the word AROJECJ?
(1) #&95@79   (2) #&@697&
(3) #&19@79   (4) #&1@97&

39. What is the code for the word HORBONE?
(1) &#&5#6@   (2) &176561
(3) &1751&@   (4) &1&516@

40. What is the code for the word EBAEROR?
   (1) 5@95717   (2) @5#@&1&
   (3) #@5#919   (4) @5#717&

41. What is the code for the word DEJHRONE?
   (1) 0@9&726@   (2) 0@9&&16@
   (3) 059&716@   (4) 059&&16@

42. What is the code for the word COBAOUND?
   (1) 715#1*60   (2) 725#2*&0
   (3) 915#1*70   (4) 725@2*60

Directions for questions 43 to 47: For the following sentences given in column I, the codes are given in column II. Answer the following questions by finding the codes for the words form the given columns.

Column I	Column II
Some people are not singer	byb cyc hyh tyt zyz
Great people are joker	tyt dyd fyf zyz
Ram is a magician	nyn gyg ryr mym
Balu is a great singer	mym byb dyd nyn lyl
Magician make people joker	tyt gyg fyf sys
No professor is joker	xyx pyp fyf mym

43. What is the code for the word 'Balu' in that language?
   (1) byb   (2) dyd
   (3) lyl   (4) nyn

44. What is the code for the word 'not' in that language?
   (1) cyc   (2) hyh
   (3) tyt   (4) Cannot be found

45. What is the code for "No magician is a professor" in that language?
   (1) mym gyg nyn cyc   (2) pyp gyg nyn mym tyt
   (3) xyx mym gyg nyn pyp   (4) Cannot be found

46. Which of the following can be the code for "Balu make great singer" in that language?
   (1) dyd sys lyl cyc   (2) lyl byb zyz fyf
   (3) mym lyl byb sys   (4) lyl dyd sys byb

47. If the code for "Dhoni is not a professor" is "nyn xyx mym yyy cyc", then what is the code for "Dhoni make some people joker"?
   (1) xyx yyh cyc tyt sys   (2) fyf yyy sys cyc tyt
   (3) hyh yyy fyf tyt sys   (4) Cannot be found

Directions for questions 48 to 52: For the following sentences given in column f^1, the codes are given in column $f^1 f^1$. Answer the following questions by finding the codes for the words form the given columns.

Column I	Column II
I do not fraud.	1 & 2 7
I get the bronze coin	4 @ 7 6 ψ
I am not the last	3 7 6 π &
Ravan do not win	1 8 & %
Last boy get the silver coin	9 π 6 θ @ ψ
Ravan is a boy	9 5 8 *

48. What is the code for 'fraud'?
   (1) 7   (2) 1   (3) &   (4) 2

49. What is the code for 'bronze'?
   (1) 4   (2) @   (3) 7   (4) ψ

50. Which word is coded as θ ?
   (1) boy   (2) get   (3) silver   (4) coin

51. What is the code for "Ravan is a fraud"?
   (1) * 8 & 5   (2) 9 8 5 2   (3) 5 * 8 2   (4) 5 4 9 2

52. What can be the code for "I get the bronze coin"?
   (1) 7 4 @ % 6   (2) 6 8 4 ψ %
   (3) 7 4 5 % 6   (4) ψ 6 4 7 @

Directions for questions 53 to 57: Given below are the codes for the digits/symbols. Study the conditions given below and answer the questions that follow.

Digit /symbol : 6 2 @ * 3 $ 1 # 7 8 4 % 5 £ 9
Letter codes : X J B P O A K N Y Q L S D M Z

Conditions:
(1) If the 1st element in the group is a symbol and the last one is an odd digit, the code for both will be C.
(2) If the 1st element is an even digit and the last element is a symbol, then codes for each of them gets interchanged.
(3) If the 1st element is an odd digit and the last element is an even digit then the code for both will be E.
(4) If both the 1st and the last elements are symbols, then the code for both will be R.

What will be the code for the following groups of numbers and symbols?

53. 7 4 5 9 8 3 6
   (1) YLDZQOX   (2) XLDZQOY
   (3) YLDQZOX   (4) ELDZQOE

54. 8 4 6 9 7 3 %
   (1) QLXZYOS   (2) QLXZYOS
   (3) CLXZYOC   (4) None of these

55. & 6 3 4 1 8 5
   (1) NXLOKQD   (2) DXOLKQN
   (3) CXOLKQC   (4) None of these

56. 4 3 2 9 6 1 @
    (1) LOJZXKB   (2) COJZXKC
    (3) EOJZXKE   (4) BOJZXKL

57. @ 3 7 * 9 6 £
    (1) MOYPZXB   (2) ROYPZXR
    (3) EOYPZXE   (4) None of these

Directions for questions 58 to 62: Given below are the codes for the digits / symbols. Answer the questions based on the codes and the conditions given below the code.

Digit/symbol	0	8	£	4	$	@	1	#	7	%	9	©	●	2	5	Σ	6
Letter Code	V	A	X	H	Q	C	R	G	B	J	F	K	N	L	T	M	E

Conditions:
(1) If both the left most and the right most objects are symbols, then the codes for the first two objects get interchanged between them and the codes for the last two objects get interchanged between them.
(2) If the left most object is a symbol and the right most is an even digit then the code for both will be D.
(3) If the left most object is an odd digit and the right most object is a symbol, then the codes of these two get interchanged.
(4) If the left most object is an odd digit and the right most object is an even digit then the code for both will be W.
(5) If the left most object in the group is an even digit and the right most object is an odd digit then, reverse the order of the code for the group.

58. 8 0 6 @ 4 9 7
    (1) MVECHFA   (2) BFHCEVA
    (3) AVECHFB   (4) XVECHFX

59. 0 & % 7 9 6 4
    (1) HEFBJGV   (2) WGJBFEW
    (3) MGJBFEM   (4) None of these

60. $ 4 7 8 0 © 6
    (1) EKVABHQ   (2) ZHBAVKZ
    (3) EHBAVKQ   (4) DHBAVKD

61. 5 1 © 2 6 9 @
    (1) CRKLEFT   (2) ZRKLEFZ
    (3) XRKLEFX   (4) DRKLEFD

62. % 8 @ 5 2 1 *
    (1) ZACTLRZ   (2) NACTLRJ
    (3) AJCTLNR   (4) None of these

63. In a certain code language, if each letter in the English alphabet, which has prime number place value, is coded as 1 and each of the remaining letters are coded as 2, then what is the code for the word EXAMINATION?
    (1) 12212222112   (2) 12212222222
    (3) 12212222212   (4) 12122212222

64. In a certain code language, if the word MANAGEMENT is coded as DAEAGEDEEB, then how is the word DEPARTURE coded in that language?
    (1) DEGAIBCIE   (2) DEFAICBIF
    (3) DEGAJBCIE   (4) DEGAHBDHE

65. In a certain code language, if the word ELECTION is coded as DMCEQLKR, then how is the word ATTITUDE coded in that language?
    (1) BSVGWRHA   (2) ZUKRQXIZ
    (3) ZURKQXZI   (4) ZURKXQZI

Coding & Decoding																									
1	3	**6**	2	**11**	4	**16**	3	**21**	4	**26**	4	**31**	1	**36**	3	**41**	2	**46**	4	**51**	3	**56**	4	**61**	1
2	2	**7**	3	**12**	3	**17**	1	**22**	2	**27**	3	**32**	3	**37**	4	**42**	1	**47**	3	**52**	4	**57**	2	**62**	3
3	3	**8**	1	**13**	4	**18**	2	**23**	1	**28**	2	**33**	4	**38**	3	**43**	3	**48**	4	**53**	4	**58**	2	**63**	2
4	1	**9**	3	**14**	1	**19**	4	**24**	4	**29**	1	**34**	1	**39**	4	**44**	4	**49**	1	**54**	4	**59**	4	**64**	1
5	3	**10**	1	**15**	1	**20**	2	**25**	1	**30**	4	**35**	4	**40**	2	**45**	3	**50**	3	**55**	3	**60**	4	**65**	3