

Home work solution - series

Q. Complete the series

Q.1 1, 3, 8, 19, 42, 89, ?

- (A) 108 (B) 184 (C) 167 (D) 97

Logic $\Rightarrow 1 \times 2 + 1 = 3, 3 \times 2 + 2 = 8, 8 \times 2 + 3 = 19, 19 \times 2 + 4 = 42,$
 $42 \times 2 + 5 = 89, (89 \times 2 + 6 = 184)$ Ans.

Q.2 5, 16, 51, 158, ?

- (A) 1452 (B) 483 (C) 481 (D) 1454

Logic $\Rightarrow 5 \times 3 + 1 = 16, 16 \times 3 + 3 = 51, 51 \times 3 + 5 = 158, (158 \times 3 + 7 = 481)$ Ans.

Q.3 2, 12, 36, 80, 150, ?

- (A) 194 (B) 210 (C) 252 (D) 258

Logic $\Rightarrow 1^3 + 1^2 = 2, 2^3 + 2^2 = 12, 3^3 + 3^2 = 36, 4^3 + 4^2 = 80, 5^3 + 5^2 = 150,$
 $(6^3 + 6^2 = 252)$ Ans.

Q.4 3, 12, 27, 48, 75, ?

- (A) 147 (B) 162 (C) 183 (D) 192 (E) 108

Logic $\Rightarrow 2^2 - 1^2 = 3, 4^2 - 2^2 = 12, 6^2 - 3^2 = 27, 8^2 - 4^2 = 48, 10^2 - 5^2 = 75, (12^2 - 6^2 = 108)$ Ans.

Q.5 4, 10, ?, 82, 244, 730

- (A) 24 (B) 28 (C) 77 (D) 218

Logic $\Rightarrow 3^1 + 1 = 4, 3^2 + 1 = 10, (3^3 + 1 = 28)$ Ans, $3^4 + 1 = 82, 3^5 + 1 = 244$

Q.6 24, 60, 120, 210, ?

- (A) 300 (B) 336 (C) 420 (D) 525

Logic $\Rightarrow 3^3 - 3 = 24, 4^3 - 4 = 60, 5^3 - 5 = 120, 6^3 - 6 = 210, (7^3 - 7 = 336)$ Ans.

Find Wrong term

Q.7 380, 188, 92, (48), 20, 8, 2

- (A) 188 (B) 92 (C) 48 (D) 20

Logic $\Rightarrow \frac{380}{2} - 2 = 188, \frac{188}{2} - 2 = 92, \frac{92}{2} - 2 = 44, \frac{44}{2} - 2 = 20, \frac{20}{2} - 2 = 8$

Q.8 3, 2, 8, (9), 13, 22, 18, 32, 28, 42

- (A) 8 (B) 9 (C) 13 (D) 22

Correct term = 12

Q.9 8, 13, 21, 32, (47), 63, 83

- (A) 13 (B) 32 (C) 47 (D) 63

Logic $\Rightarrow 8 + 5 = 13, 13 + 8 = 21, 21 + 11 = 32, 32 + 14 = 46, 46 + 17 = 63$

Q.10

89, 78, (86), 80, 85, 82, 83

- (A) 83 (B) 82 (C) 86 (D) 78

Correct term = 87

Complete the series

Q.11

O T E, P U F, Q V G, R W H, ?

- (A) S Y J (B) T X I (C) S X J (D) S X I

Logic \Rightarrow O P Q R (S), T U V W (X), E F G H (I)

Q.12

2Z5, 7Y7, 14X9, 23W11, 34V13, ?

- (A) 27U24, (B) 47U15 (C) 45U15 (D) 47U14

Logic

2Z5, 7Y7, 14X9, 23W11, 34V13, 47U15

\Rightarrow Z, Y, X, W, V, U

Q.13 b - ac / - cc / cb - a / b - ac

- (A) cbaba (B) bbacc (C) abbba (D) aqbba

Logic \Rightarrow I \rightarrow break in group, II \rightarrow compare the group (Ist & 4th group)

Means first and fourth group same, so alphabet will same

Q.14 abc - / d - bc / - d - b / - cda

- (A) bacde (B) cdabe (C) dacab (D) decdb

Logic \Rightarrow abcd, dabc, cdab, bcda
(observe cycle here)

Q.15 2, 12, 20, ?, 110

- (A) 42 (B) 49 (C) 56 (D) 28

Logic \Rightarrow $2^2 - 2 = 2$, $4^2 - 4 = 12$, $5^2 - 5 = 20$, $8^2 - 8 = 56$, $11^2 - 11 = 110$
Ans.

Q.16 1, ⁺⁴ 5, ⁺⁶ 11, ⁺⁸ 19, ?

- (A) 289 (B) 256 (C) 361 (D) 369

Logic $\frac{1^2}{+6} = 1$, $\frac{7^2}{+6} = 49$, $\frac{13^2}{+6} = 169$, $\frac{19^2}{+6} = 361$

Q.17 DF, GJ, KM, NQ, RT, ?

- (A) UW (B) YZ (C) XZ (D) UX

Logic \Rightarrow DEF, GHIJ, KLM, NOPQ, RST, UVWX
+1 +2 +1 +2 +1 +2
Ans.

Q.18 1, -8, 81, ?, 15625

(A) -1022 (B) -1024 (C) -4095 (D) -4096

Logic $\Rightarrow (1)^2, (-2)^3, (3)^4, \underline{(-4)^5}, (5)^6$

Q.19 5, 7, 14, 24, 42, ?, 119

(A) 71 (B) 65 (C) 67 (D) 63

Logic $\Rightarrow 5+7+2=14, 7+14+3=24, 14+24+4=42$
 $\Rightarrow 42+42+5=71, 42+71+6=119$
Ans

Q.20 1332, 732, 348, ?, 36, 12

(A) 32 (B) 132 (C) 148 (D) 216

Logic $\Rightarrow \underline{11^3+1}, \underline{9^3+3}, \underline{7^3+5}, \underline{5^3+7}, 3^3+9, 1^3+11$
Ans