Number System Aptitude Questions and Answers Pdf

1. How many of the integers between 110 and 120 are prime numbers?

(A) 1

(B) 2

(C) 3

(D) 4

Ans: A

Each one of 112, 114, 116, 118 is divisible by 2. So, none is prime.

Each one of 111, 114, 117 is divisible by 3. So, none is prime.

Clearly, 115 is divisible by 5. So, it is prime.

Each one of 112 and 119 is divisible by 7. So, none is prime. Hence, there is only 1 prime number between 110 and 120, which is 113.

2. The number of prime numbers between 0 and 50 is

(A) 14

(B) 15

(C) 16

(D) 17

Ans: B

Prime numbers between 0 and 50 are 2, 3, 5, 7, 11, 13, 17, 19, 23, 29, 31, 37, 41, 43 and 47.

Their number is 15.

3. Which one of the following numbers is divisible by 3?

(A) 2345678

(B) 2876423

(C) 4006020

(D) 9566003

Ans: C

Sum of the digits in 4006020 is 12, which is divisible by 3.

Hence 4006020 is divisible by 3.

4. Which one of the following is the number by which the product of 8 consecutive integers is divisible?

(A) 4!

(B) 6!

(C) 7!

(D) 8!

(E) All of these

Ans: E

The product of 8 consecutive numbers is divisible by each one of 8!, 7!, 6!, 5!, 4!, 3! and 2!

5. The number of prime numbers between 301 and 320 are

(A) 3

(B) 4

(C) 5

(D) 6

Ans: C

Each of the numbers 302, 303, 304, 305, 306, 308, 309, 310, 312, 314, 315, 316 and 318 is clearly a composite number.

Out of 307, 311, 313, 317 and 319 clearly everyone is prime.

Hence, there are 5 prime numbers between 301 and 320.

6. What is the minimum number of four digits formed by using the digit 2, 3, 0, 7?

(A) 2047

(B) 2247

(C) 2407

(D) 2470

Ans: A

Required number = 2047.

7. The sum of the greatest and smallest number of five digits is

(A) 10,999

(B) 109,999

(C) 11,110

(D) 111,110

Ans: B

Required sum = (99999 + 10000) = 109999.

8. 38649 – 1624 – 4483 = ?

(A) 32425

(B) 32452

(C) 34522

(D) 32542

Ans: D

Given expression = 38649 – (1624 + 4483)

= 38649 – 6107 = 32542.

9. 587 x 999 = ?

(A) 586413

(B) 587523

(C) 614823

(D) 615173

Ans: A

587 x 999

= 587 x (1000 – 1)

= (587 x 1000) – (587 x 1)

= 587000 – 587

= 586413.

10. The sum of the first four primes is

(A) 10

(B) 11

(C) 16

(D) 17

Ans: D

Sum of first four prime numbers = (2 + 3 + 5 + 7) = 17.