

CLASS – X: CHAPTER - 1

REAL NUMBERS

MCQ

Q.1. If two positive integers P and Q are written as $P = x^3y^3$ and $Q = xy^4$, where x, y are the prime numbers, then HCF (P, Q) is

- (a) xy (b) xy^3 (c) x^3y^3 (d) x^4y^4

Ans. (b) xy^3

Q.2. The decimal expansion of the rational number $\frac{63}{2^3 \times 5}$ will terminate after

- (a) one decimal place (b) two decimal places (c) three decimal places (d) four decimal places

Ans. (c) three decimal places

Q.3. The HCF of 171 and 95 is:

- (a) 19 (b) 855 (c) 1 (d) 171

Ans. (a) 19

Q.4. If two positive integers P and Q are written as $P = x^4y^3$ and $Q = xy^4$, where x, y are the prime numbers, then LCM (P, Q) is

- (a) xy (b) xy^3 (c) x^3y^3 (d) x^4y^4

Ans. (d) x^4y^4

Q.5. The least number that is divisible by all the numbers from 1 to 8 (both inclusive) is

- (a) 80 (b) 1260 (c) 840 (d) 2520

Ans. (c) 840

Q.6. The decimal expansion of number $\frac{3087}{2^5 \times 5^2 \times 7}$ has:

- (a) a terminating decimal (b) non-terminating but repeating
(c) non-terminating non repeating (d) terminating after four places of decimal

Ans. (a) a terminating decimal

Q.7. For any positive integer a and 5, there exist unique integers q and r such that $a = 5q + r$, where r must satisfy :

- (a) $0 < r \leq 5$ (b) $1 < r < 5$ (c) $0 < r < 5$ (d) $0 \leq r < 5$

Ans. (d) $0 \leq r < 5$

Q.8. The number $(\pi - 3)$ is :

- (a) a rational number (b) an irrational number (c) a prime number (d) an even number

Ans. (b) an irrational number

Q.9. $19.\overline{85}$ is :

- (a) a rational number (b) an irrational number (c) an integer (d) an even number

Ans. (a) a rational number

Q.10. The smallest number by which $\sqrt{75}$ should be multiplied so as to get a rational number is

- (a) 3 (b) $\sqrt{3}$ (c) $\sqrt{75}$ (d) $5\sqrt{3}$

Ans. (b) $\sqrt{3}$
