

3.0.0 Divisibility Tests Questions

1. If a positive integer n is divided by 5, the remainder is 3. Which of the numbers below yields a remainder of 0 when it is divided by 5?
A) $n + 3$ B) $n + 2$ C) $n - 1$ D) $n - 2$ E) $n + 1$
2. If an integer n is divisible by 3, 5 and 12, what is the next larger integer divisible by all these numbers?
A) $n + 3$ B) $n + 5$ C) $n + 12$ D) $n + 60$ E) $n + 15$
3. What is the smallest integer that is multiple of 5, 7 and 20?
A) 70 B) 35 C) 200 D) 280 E) 140
4. When the integer n is divided by 8, the remainder is 3. What is the remainder if $6n$ is divided by 8?
A) 0 B) 1 C) 2 D) 3 E) 4
5. If n is an integer, when $(2n + 2)^2$ is divided by 4 the remainder is
A) 0 B) 1 C) 2 D) 3 E) 4