1

The integers m and p are such that 2<m<p, and m is not a factor of p. if r is the remainder when p is divided by m, is r>1?

(1) the greatest common factor of m and p is 2
(2) the least common multiple of m and p is 30

2

If w, x, y, and z are the digits of the four-digit number N, a positive integer, what is the remainder when N is divided by 9?

(1) w + x + y + z = 13
(2) N + 5 is divisible by 9

3

If k is a positive integer, What is the remainder when 2^k is divided by 10?

(1) k is divisible by 10
(2) k is divisible by 4

4

A person inherited few gold coins from his father. If he put 9 coins in each bag then 7 coins are left over. However if he puts 7 coins in each bag then 3 coins are left over. What is the number of coins he inherited from his father.

(1) The number of coins lies between 50 to 120.
(2) If he put 13 coins in each bag then no coin is left over and number of coins being lesser than 200.