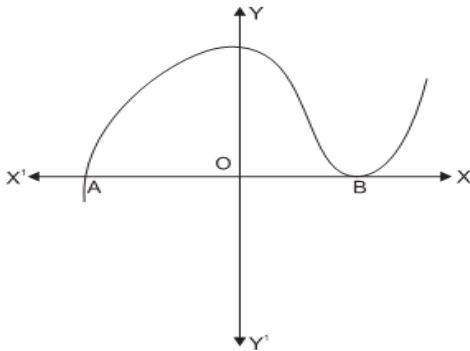


## CBSE TEST PAPER-01

### MATHEMATICS (Class-10)

#### Chapter 2. Polynomials

1. The graph of  $y=f(x)$  is given below. Find the number of zeroes of  $f(x)$ . (1 mark)



2. Write the zeroes of the polynomial  $x^2 - x - 4$ . (1 mark)
3. Find a quadratic polynomial, the sum and product of whose zeroes are 0 and  $\sqrt{5}$ , respectively. (2 marks)
4. Find the quadratic polynomial, the sum and product of whose zeroes are 4 and 1, respectively. (2 marks)
5. If  $\alpha$  and  $\beta$  are the zeros of the quadratic polynomial  $f(x) = x^2 - 5x + 4$ , find the value of  $\frac{1}{\alpha} + \frac{1}{\beta} - 2\alpha\beta$ . (2 marks)
6. Find the zeroes of the quadratic polynomial  $4\sqrt{3}x^2 + 5x - 2\sqrt{3}$  and verify the relationship between the zeroes and the coefficients. (3 marks)
7. Find the zeroes of the quadratic polynomial  $4u^2 + 8u$  and verify the relationship between the zeroes and the coefficients. (3 marks)