

1.7 Form a quadratic equation whose roots are -4 and 6 .

Solution: We have sum of the roots, $S = -4 + 6 = 2$ and, product of the roots, $P = -4 \times 6 = -24$. Hence, the required equation is

$$x^2 - Sx + P = 0$$

$$\rightarrow \cancel{x^2 - 2x} \rightarrow \Rightarrow x^2 - 2x - 24 = 0.$$