

Q.11.

(a) If $a + \frac{1}{a} = p$ show that $a^3 + \frac{1}{a^3} = p^3 - 3$. [3]

(b) Solve: $\frac{5}{x} - \frac{3}{y} = 4$, $\frac{2}{x} - \frac{5}{y} = 5$. [4]

(c) Find the mean of the following data: [3]

x	25	35	45	55	65	75
f	10	6	8	12	5	9