Related Questions with Solutions

Questions

Quetion: 01

The value of $\sqrt{99}$ upto three decimals is-

A. 9.949

B. 9.958

C. 9.944

D. 9.939

Solutions

Solution: 01

$$(100 - 1)^{1/2} = 10 \left(1 - \frac{1}{100} \right)^{1/2}$$

$$= 10 \left[1 + \left(\frac{1}{2} \right) \left(-\frac{1}{100} \right) + \frac{\left(\frac{1}{2} \right) \left(\frac{1}{2} - 1 \right)}{2!} \left(\frac{-1}{100} \right)^2 + \cdots \right]$$

$$= 10 \left[1 - \frac{1}{200} - \frac{1}{8 \times 10^4} \cdots \right]$$

$$= 9.9498$$

Correct Options

Answer:01

Correct Options: A