

Correct. 117 is between the perfect squares 100 and 121. So $\sqrt{117}$ must be between $\sqrt{100}$ and $\sqrt{121}$.

$$\sqrt{100} = 10 \text{ and } \sqrt{121} = 11$$

Because 117 is closer to 121 than it is to 100, $\sqrt{117}$ is probably about 10.8 or 10.9.

$$10.8 \cdot 10.8 = 116.64 \text{ and } 10.9 \cdot 10.9 = 118.81$$

$(10.8)^2$ gives a closer approximation than $(10.9)^2$, so the answer is 10.8.