

✔ Congratulations! You passed!

Grade received 100%

Latest Submission Grade 100%

To pass 80% or higher

Go to next item

1. For a random variable $X \sim N(\mu, \sigma^2)$. find the MLE for μ, σ^2 A = $\overline{X}, \frac{\sum_i (X - \overline{X})^2}{n}$ B = $\overline{X}, \frac{\sum_i (X - \overline{X})^2}{n-1}$ 1 / 1 point

☒ A
☐ B

☒ **Correct**
 Correct. The MLE is the sample mean.

2. Does the MLE of the last question agree with that of the MoM estimator? 1 / 1 point

☒ Yes
☐ No

☒ **Correct**
 Correct! In this case, the two agree.

3. The MLE estimator is invariant to transformation. If you want an estimate for μ^2 and have the estimate for μ , you can simply take the estimate $\hat{\mu}^2$. 1 / 1 point

☒ True
☐ False

**Correct**

MLE's are invariant to transformations. NOTE: the bias in the estimate is not!