

Answer on Question #78837 – Math – Statistics and Probability

Question

State whether the null hypothesis should be rejected on the basis of the given P-value

- (i) P-value = 0.0684, $\alpha = 0.10$, two tailed test
- (ii) P-value = 0.0153, $\alpha = 0.01$, one tailed test
- (iii) P-value = 0.0232, $\alpha = 0.05$, two tailed test
- (iv) P-value = 0.002, $\alpha = 0.01$, one tailed test.

Solution

- (i) Reject the null hypothesis ($0.0684 < 0.10$).
- (ii) Fail to reject the null hypothesis ($0.0153 > 0.01$).
- (iii) Reject the null hypothesis ($0.0232 < 0.05$).
- (iv) Reject the null hypothesis ($0.002 < 0.01$).

Answer: (i) Reject the null hypothesis; (ii) Fail to reject the null hypothesis;
(iii) Reject the null hypothesis; (iv) Reject the null hypothesis.