Details:

For the following assignment, **use the Rank Correlation Utilizing Excel**

Use a rank correlation coefficient to test for a correlation between two variables.

Use a significance level of α=0.05.

|  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| x (cigarettes per day) | 60 | 10 | 4 | 15 | 10 | 1 | 20 | 8 | 7 | 10 | 10 | 20 |
| y(cotinine) | 179 | 283 | 75.6 | 174 | 209 | 9.51 | 350 | 1.85 | 43.4 | 25.1 | 408 | 344 |

The new health care program in the United States makes provisions for capitation programs where health care insurers work with clinical facilities to perform risk analysis of patients to determine the cost of providing care. The following assignment might be used to assess how much a person smokes.

In a 500 words answer the following questions

* use the Rank Correlation Utilizing Excel Pearson or Spearman
* Is there a significant linear correlation?
* How would you measure the cotinine level in the body? Explain the result.
* Which one is a non-parametric test?
* Minimum two reference

What are the results, what do the results mean for this specific topic, then what those results might mean for the big picture?

**REPORT HOW TO: For the statistical assignment**

You will obtain your numerical answer using Excel and then compare and interpret the results in text format. This is expected to be a minimum of 500 words, references and solid academic writing.

HOW TO: Imagine that you are working in a public health facility and you have been asked to analyze this data for someone. What does it MEAN? What can you tell your supervisor about what this data means about.

DO NOT include any figures or tables… only sentences and paragraphs with citations/references.

This report IS NOT about how you did your homework assignment.

NOTE: Only the interval numbers should be stated in your report… do not state any other numbers that come from your results in Excel… the only exception would be if you wanted to include mean and standard deviation. Not including the relevant numbers and explaining what they mean or including numbers other than the ones approved will result in a lower score.

NOTE: Only the Test statistic and P-value should be stated in your report… do not state any other numbers that come from your results in Excel. Not including the relevant numbers and explaining what they mean or including numbers other than the ones approved will result in a lower score.