

2.6: Statistical Visualizations: Scatterplots & Bubble Charts

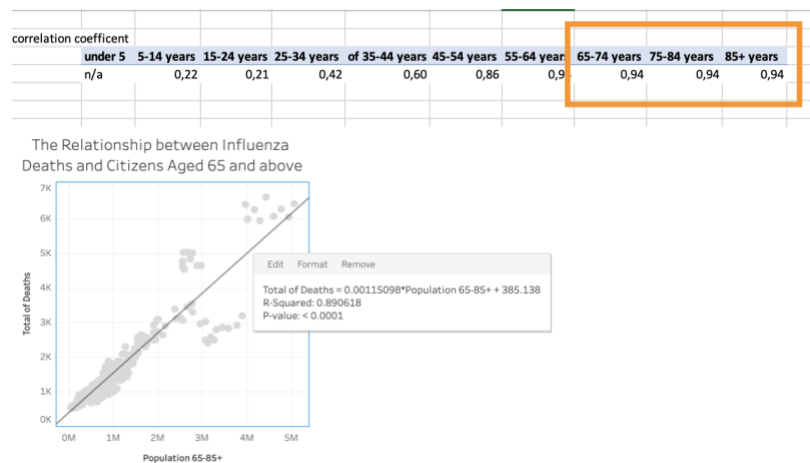
Link: https://public.tableau.com/views/PreparingInfluenzaSeason_16604201832430/Scatterplot?:language=en-US&:display_count=n&:origin=viz_share_link

1. Refer back to the task in Exercise 1.8: Conducting Statistical Analyses where you examined correlations. Use those same variables to create a scatterplot in Tableau.
2. Add a trend line to the scatterplot you just created.
3. Compare Tableau's r-squared value to the correlation coefficient you calculated in Exercise 1.8. After converting the r-squared value to the Pearson's correlation coefficient by taking the square root, they should be the same. If not, check your calculations from Exercise 1.8 and possibly consult with your tutor if you can't determine why the difference is occurring.



After converting the r-squared value to Pearson's correlation coefficient by taking the square root, the values are the same as the correlation from Exercise 1.8.

It is a strong positive correlation. Correlation 0,94.



4. Take a moment to reflect on whether the chart provides any additional insight that the calculated correlation coefficient didn't.

- all the data values tightly clustered around the trend line or are there a few extreme values?

The lower population the tighter data. The distance between values increases when the population increases starting approximately 250K+.

5. Duplicate your scatterplot onto a new Tableau sheet. (This is where you'll create your bubble chart.)

6. Remove the trend line from the chart on your new sheet.

7. Add a third numeric variable to your scatterplot to create a bubble chart.

Add a categorical variable to the scatterplot using color as the visualization method.

8. Assess your scatterplot and bubble chart using the style guide you created in Exercise 2.2.

Adjust the colors, number of categories, labels, and titles to align with visualization best practices.

