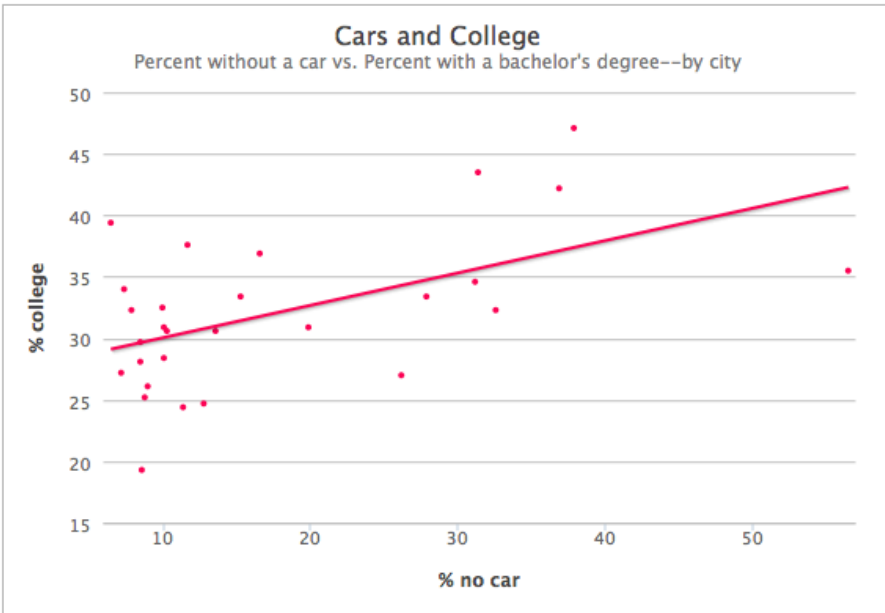


Quiz 10

Name \_\_\_\_\_

The following scatterplot showing the percentage of bachelor degree holders and the percentage of people not owning a car in several US cities.<sup>1</sup>



- (a) In this scatterplot, which is the
  - i. Explanatory variable?
  - ii. Response variable?
  
- (b) Check the equation that is closest to the equation of the regression line shown: (Assume  $y = \% \text{ college}$  and  $x = \% \text{ no car}$ .) *Check one*
  - \_\_\_  $y = 0.275x + 30$
  - \_\_\_  $y - 0.29 = 0.275x$
  - \_\_\_  $y = 27.5x + 29$
  - \_\_\_  $y = 0.275x + 27$
  - \_\_\_  $y = 27.5x + 2.75$
  
- (c) Interpret the slope of the line in this context.
  
  
  
  
  
  
  
  
  
  
- (d) Based on the scatterplot, mark each of the following statements as True (T) or False (F)
  - \_\_\_ If a mayor discourages car ownership, the percent of bachelor's degrees in the mayor's city will increase
  - \_\_\_ High car ownership corresponds to a low proportion of bachelor's degree holders
  - \_\_\_ "Green cities" attract college graduates
  - \_\_\_ There is a negative association between car ownership and bachelor's degrees

<sup>1</sup> <http://www.theatlantic.com/business/archive/2014/01/why-do-the-smartest-cities-have-the-smallest-share-of-cars/283234/>