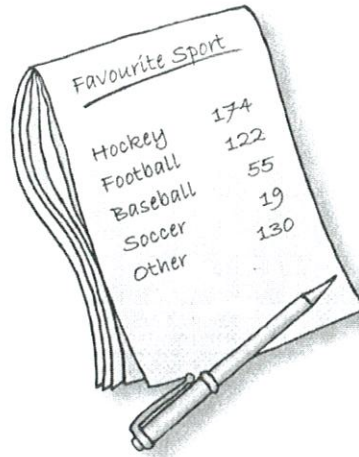


Statistics and Probability 3

Name: _____

Use the following information to answer question 30.

In a survey, 500 people were asked to name their favourite sport. The results of the survey are shown below.



Favourite Sport	
Hockey	174
Football	122
Baseball	55
Soccer	19
Other	130

$$\frac{122}{500} = 0.244$$

$$0.244 \times 360 = 87.84$$

88°

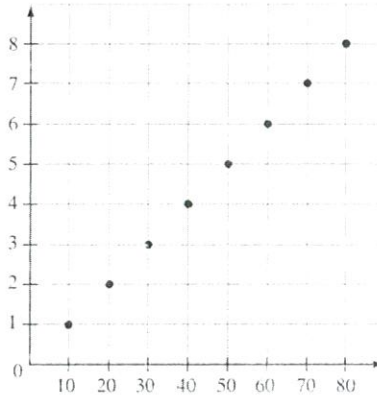
30. If the data results were displayed on a circle graph, then the measure of the angle that would represent how many people selected football would be approximately
- A. 33°
 - B. 88°
 - C. 122°
 - D. 244°

Statistics and Probability 3

Name: _____

Use the following information to answer question 33.

Various points have been plotted on the graph below. The title of the graph and the labels of the axes have been omitted.



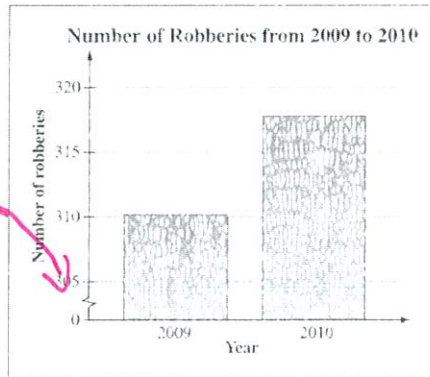
33. Which of the following statements is a possible interpretation of the graph above?

- A. Nicole earns \$20 for each hour she works. *(1, 20) doesn't work*
- B. For every 10 swimmers, 2 lifeguards are needed. *(10, 2) doesn't work*
- C. For every 10 pieces of candy Simone buys, she pays \$1. *(10, 1) works*
- D. A runner runs at a constant speed of 2 km every 30 minutes. *(2, 30) doesn't work*

Use the following information to answer question 40.

The local newspaper of a large city printed the following graph with the following headline:

“Robberies are Predicted to Double in 2011”



40. The newspaper headline is **not** a reasonable interpretation of the graph shown above because the

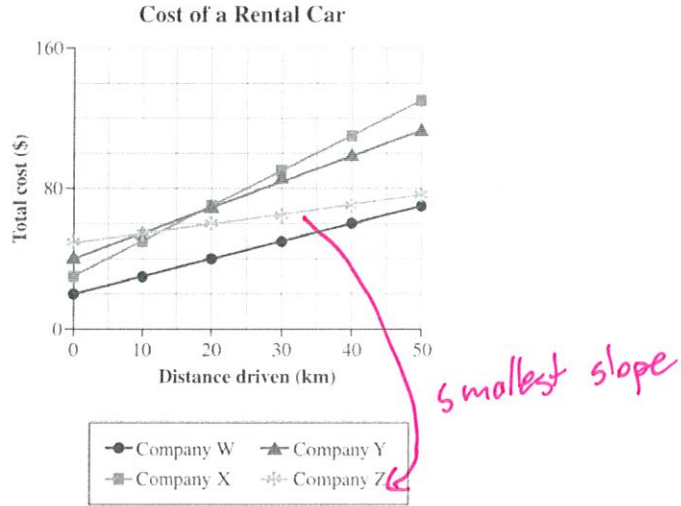
- A. width of the bars is exaggerated
- B. scale of the y-axis is misleading
- C. probability is based on theoretical data
- D. probability is based on experimental data

Statistics and Probability 3

Name: _____

Use the following information to answer question 13.

The cost of renting a car includes the base fee and a charge for each kilometre driven. The graph below represents the total cost of renting a vehicle at four different rental car companies.



13. Which rental car company has the smallest charge for each kilometre driven?

- A. Company W
- B. Company X
- C. Company Y
- D. Company Z**

Use the following information to answer question 40.

The chart below shows the life expectancies, at birth, of males and females in a particular country over 40 years.

Year of Birth	Life Expectancy at Birth (years)	
	Male	Female
1970	67.1	74.1
1980	70.0	76.5
1990	71.8	78.5
2000	74.3	79.6
2010	75.2	80.4

80.7

40. Which of the following assumptions supports the prediction that a female born in the year 2020 in this country will live to the age of 80.7 years?

- A. Females in this country live longer than males.
- B. The life expectancy for females will continue to slowly increase.**
- C. Changes in the environment will reduce life expectancies by 2020.
- D. The gap between the life expectancies of males and females will be smaller in 2020.