

Section 1: From assigned reading

<p>What is a scatterplot?</p>	
<p>Why is it important to look at a scatterplot?</p>	
<p>What are the key characteristics for these types of curves?</p>	<p>Linear:</p>
	<p>Quadratic:</p>
	<p>Cubic:</p>
	<p>Quartic:</p>
	<p>Natural Log (ln):</p>
	<p>Exponential:</p>
<p>What is meant by scatter plots showing trends?</p>	
<p>What is a linear trend?</p>	
<p>What is a positive association?</p>	
<p>What is a negative association?</p>	
<p>What is a line of best fit?</p>	

Section 1: From assigned reading (continued)

Give an example of a strong linear relationship as determined by a scatterplot?	
Give an example of a weak linear relationship as determined by a scatterplot?	
Give an example of a perfect linear relationship as determined by a scatterplot?	
Perfect linear relationships are usually an indication of what type of data?	

Calculator Concepts:

How is a scatterplot set up in the calculator?	
What important feature needs to be remembered when using a scatterplot in terms of the window option for the calculator?	

Section 2: From assigned reading

What is a correlation coefficient ?	
Does a strong or perfect correlation coefficient imply that the variables have a cause and effect relationship? Explain.	
Does the correlation coefficient determine if a relationship is linear? Use Brainly AI to read about and determine the answer.	
What is a residual plot ?	
How is a residual plot used to determine the model of best fit?	

Calculator Concepts:

Where is the correlation coefficient found on the calculator?	
How is a residual plot setup on the calculator?	
What is the difference between a residual plot and a scatterplot?	

Section 3: From assigned reading

What is a regression line ?	
What is a regression model ?	
What is a vertical intercept ?	
What is meant by slope ?	
How is the correlation coefficient “ r ” related to the slope? Are the values the same?	
What is an explanatory variable ?	
What is the predictor variable ?	
What is the independent variable?	
What is the response variable ?	
What is the dependent variable?	
When a linear regression equation is generated, what point is guaranteed to be on the line?	
What does a regression line predict for any given x-value? Think about the response from the previous question.	
If no significant linear model can be generated from the data, what is the best predicted value for any given “x”?	

Section 4: From assigned reading

How is the coefficient of determination calculated?	
How is the coefficient of determination used with regression models?	
What does interpolation mean?	
How is interpolation related to regression?	
What is extrapolation ?	
What is the caution when extrapolating responses on a regression model?	
What are influential points in a regression model?	
What are outliers in a regression model?	
What does it imply to have a regression toward the mean ?	
What is meant by aggregate data ?	

Remember that not everything will be found in the book. Use the resources available to understand the vocabulary and concepts outlined in this document.