

Georgia Highlands College
Instructions for MINITAB
Created by Laura Ralston
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This document includes steps to complete the following statistical analyses using the MINITAB software available on the Georgia Highlands College computer network:

Histograms, Dotplots, Measures of Center and Variation, Correlation, Regression (including a regression line), Binomial Probabilities

Histograms

Enter Data in worksheet (column 1)

Label column ---- be detailed, using units of measurement as appropriate

On the main menu bar, at the top of the screen, go to GRAPH,

On the drop down menu, select **Histogram**

The histogram "wizard" should appear. You must tell the wizard what to graph---that is, where is the data???

Use Annotations on the wizard to add a title to the graph AND to show data labels for the x-axis and y-axis.

Dotplots

Enter Data in worksheet (column 1)

Label column ---- be detailed, using units of measurement as appropriate

On the main menu bar, at the top of the screen, go to GRAPH,

On the drop down menu, select **Dotplot**

The dotplot "wizard" should appear. You must tell the wizard what to graph---that is, where is the data???

Give the dotplot a title on the wizard.

Measure of Center & Variation

Enter Data in worksheet (column 1)

Label column ---- be detailed, using units of measurement as appropriate

On the main menu bar, at the top of the screen, go to STAT,

On the drop down menu, select **Basic Statistics**,

On the second drop down menu, select *Display Descriptive Statistics*

The stat "wizard" should appear. You must tell the wizard what to compute---that is, where is the data???

This one option provides the mean, median, std dev (standard deviation), max, and min.

Correlation

Enter Data

Go to STAT ---Basic Statistics--- Correlation

The correlation wizard will appear.

You must tell the wizard where the paired data is located. Remember to put a space between the column names.

Click OK

This will display the correlation coefficient in the session window. Ignore the "p-value".

Regression Equation

Enter Data

Go to STAT ---Regression ----Regression

The regression wizard will appear

You must tell the wizard where the following is located:

Response variable (y) is typically the second row or column in a table

Predictor variable (x) is typically the first row or column in a table

Click OK

This will give you the regression equation (in the session window) along with a bunch of other unnecessary information that we are not using, just ignore it!

Regression Line (Graph—Fitted Line Plot)

Enter Data

Go to STAT---Regression --- Fitted Line Plot

The fitted line plot wizard will appear

You must tell the wizard where the following is located:

Response variable(y)

Predictor variable(x)

And select the type of model –by default, LINEAR is selected.

WE ARE ONLY DISCUSSING LINEAR IN THIS COURSE!!!

Click OK

This will give you a scatterplot with the regression line superimposed and the regression equation will be above the graph.

Binomial Probability Distributions

1. Enter possible values for the random variable in Column 1 (C1)
2. Go to CALC ---Probability Distributions---Binomial
3. The binomial distribution wizard will appear
By default, the probability distribution option is selected. This is the option you want.

You must enter the number of trials. This corresponds to “n” in the problem.

You must enter the probability of success. This corresponds to “p” in the problem.

You must enter the input column. This is wherever you put the data.

Click OK

4. The probability density function will appear in the session window. You will have to use it appropriately to answer the questions asked in regards to the problem.