

## DSO101 Lesson 9 High Level Data Exploration – Study Guide

### Key Terms:

**Pie Chart** - Page 6: A graph of the frequencies or percentages for a single **categorical** variable.

**Histogram** - Page 4: A graph of the spread of the data for a single quantitative/continuous variable.

**Histograms with multiple groups** - Page 4: Show the spread of data from a single quantitative/continuous **variable**, where each data point belongs to one of two or more groups. The groups are usually **categorical** variables.

**Scatterplot** - Page 8: A graph of two quantitative/**continuous** variables, one for each axis.

**Pareto Chart** - Page 7: A type of bar chart in which the bars are ordered from largest to smallest and a cumulative count is shown as a line in the same chart. A single **categorical** variable, with multiple categories and counts for each category.

**Bar Graph** - Page 7: A graph of the frequencies or percentages for a single **categorical** variable.

**Tree Maps** - Page 12: A graph that displays one quantitative/**continuous** variable and one **categorical** variable with multiple levels.

**Heat Maps** - Page 12: A graph that displays one quantitative/**continuous** variable descriptively with "hot" and "cold" colors as well as a **categorical** variable.

**Line Graph** - Page 9: A graph of two quantitative/**continuous** variables, one of which must have a time or distance component (which is shown on the x axis).

**Boxplot** - Page 5: A graph of the spread of data around the mean for a single quantitative/continuous variable

**Side-by-Side Boxplot** - Page 5: A graph of the spread of data around the mean for one quantitative/**continuous** variable by one **categorical** variable with two or more groups.

**Data Map** - Page 10: A graph of a single quantitative/**continuous** variable and a **categorical** variable that is a location.

**Stacked Bar Graph** - Page 7: A graph of the frequencies or percentages of two categorical variables (one for the different bars, and one for the stack in the bars).