

1.
 - a. A pivot table is a table most commonly used in Microsoft Excel, which enables grouping of data by various statistics which can be customized by the user
 - b. Excel is useful for inspecting raw data, and for sorting data according to a particular value. However, with larger data sets it can be more difficult to find errors in the data, or inconsistencies in the way that data is handled. It can also be difficult to do more complex statistical analysis on data through Excel.
 - c. When a programming language is open source, its original source code is publicly available, meaning that companies and individuals alike can modify the code.
 - d. Open source software has many advantages, including extensive modifications that are available to the software. For instance, Java is an open source programming language, and it has a large library available to the public to make programming more simplistic.
2.
 - a. Nevada had the county with the highest CV% in 2012.
 - b. The East district of Idaho had the largest value of barley in 2017.
 - c. The Toole County in Montana had the largest combined value of barley for both years.
3.
 - a. After removing repeated values and spelling differences, there are around 348 distinct values of ramen being reviewed.
 - b. Top Ten data exists for the years 2012-2016, although not all of the brands in that top ten.
 - c. The brands Nongshim, Annie Chun's, Authentically Asian, Dream Kitchen, Fortune, Gefen, Goku-Uma, IbuRamen, Koyo, Lotus Foods, Mama Pat's, Maruchan, Myojo, Nissin, Sakura Noodle, Sapphoro Ichiban (my dad's personal favorite), Shirakiku, Sun Noodle, Tasty Bite, Thai Kitchen, Thai Pavilion, Thai Smile, Tradition, and Yamachan are among the major brands made in the USA, although there are other brands that have only made one variety of ramen, such as Lipton the tea company, and Roland, the musical instrument manufacturer.
 - d. Prima Taste and MyKuali are the two brands that have been #1 on the Top Tens list for the years 2012-2016.
 - e. There are 278 different varieties of spicy ramen.
 - f. After averaging the star ratings for each country, I have discovered that Brazil has the highest average ramen rating. Please don't tell my parents as they are Japanese and would be severely disappointed.
 - g. In order to best advise a group which ramen company to invest in, I would want to see the dates of the ratings to know the extrapolation of the ramen ratings and which ramen companies have had the most popularity recently. However, since I don't have that data, I would recommend some highly rated brands such as Prima and Myori, and diverse brands such as Nissin. My primary recommendation would be MyKuali, as it is both a relatively diverse and highly rated brand. However, it's important to recognize that there would be many other

elements that would factor into investment, as certain predictions cannot be made with the limited amount and variety of data that is provided.