Crookston Yield, bushels/acre

Duluth Yield, bushels/acre

Grand Rapids Yield, bushels/acre

Morris Yield, bushels/acre

University Farm, bushels/acre

Waseca Farm, bushels/acre

CS448B
Christian Valadez
Assignment #1

<center>Barley Yield Data Write-Up</center>
        Because of the amount of data and the limitation of an 8.5 x 11 inch paper, it was a challenge to create a diagram that would contain all of the given data points and communicate the differences in yield per site and per variety effectively. So when thinking about how to best represent this data, I asked myself, "What is the most important feature that is contained in all of this data?"

        I decided that the major trend I wanted to represent was the change in yield from 1931 to 1932, and to be able to compare the yield of each variety per site. To accomplish this, I used color to differentiate the 2 years, with blue corresponding to 1931, and red corresponding to 1932. Each site was given its own bar chart, with different columns containing the different varieties within that site. I used a bar chart because it was the most effective in communicating the yield amount and providing a comparison to other varieties.

        I also stacked the site charts vertically in order to effectively communicate how the yield changed per variety. It's easy to look at a single column, i.e. Glabron, and compare whether the yield increased or decreased that year per site.

        However, a major limitation of my visualization is that it is difficult to compare the actual yield amount from site to site, because the charts are stacked vertically. Originally, I intended to have the charts placed side-to-side, and stretched horizontally so that it would show the yield number from each site and variety. However, due to the limitation of having this diagram printed on an 8.5 x 11 inch paper, the design was not feasible. Instead, I stacked them vertically. A horizontal design is something that I would consider implementing via a web interface.

I used Microsoft Excel to create this visualization.