# Data Visualization Portfolio

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### About

The following are a collage of visualizations from different projects. I've compiled them here to demonstrate how I approach stylizing different types of visualizations. To view the analytics projects and code, please click here to visit my GitHub profile.

## Line Graphs

#### Global Lab Supply Item Demand

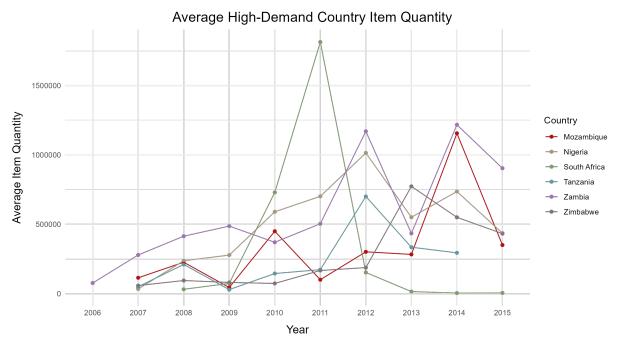


Figure 5: Average item quantity ordered by high-demand African countries between 2006 and 2015 colored by product type.

#### **Decision Tree Model Evaluation**

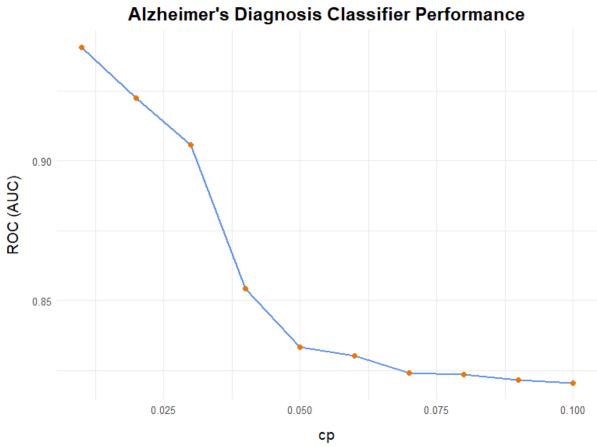


Figure 1: Decision tree ROC (AUC) metric variation with complexity parameter (cp)

### Bar Graphs

#### **Bed Supply Analysis**

#### **ICU and SICU Bed Type Counts** ICU Chattanooga Hamilton County Hospital Authority Saint Josephs Hospital and Medical Center University Hospital in Bexar County Carolinas Medical Center Jackson Memorial Hospital Grady Memorial Hospital University of Minnesota Medical Center Fairview UC Health University Hospital Shands Hospital at the University of Florida Bed Type University of Maryland Medical Center License SICU Census Chattanooga Hamilton County Hospital Authority Staffed Saint Josephs Hospital and Medical Center University Hospital in Bexar County Carolinas Medical Center Jackson Memorial Hospital Grady Memorial Hospital University of Minnesota Medical Center Fairview UC Health University Hospital Shands Hospital at the University of Florida University of Maryland Medical Center

Bed Count

Figure 7: ICU and SICU bed type counts for top hospitals

300

400

200

100

### **Admissions Analysis**

### **Substance Use by Age Group** 1e+05 Number of Admissions Substance Alcohol Other Cocaine (incl. Crack) Heroin Marijuana (incl. Hashish) Other Opioids 0e+00 <18 18-24 25-34 35-44 45-54 55+ Age Group

Stacked bar showing substance use by age group from 2007-2017.

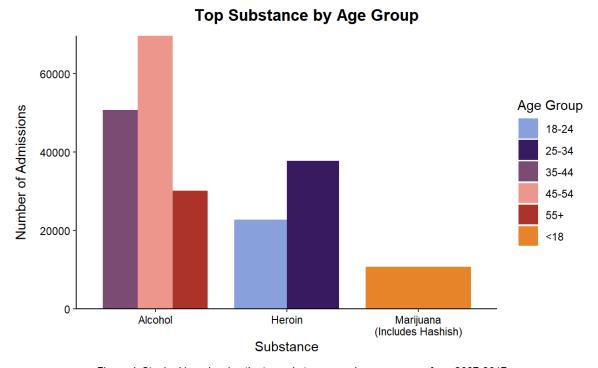


Figure 4: Stacked bar showing the top substance used per age group from 2007-2017.

#### **Dot Plots**

#### **Bed Supply Analysis**

#### **ICU and SICU Bed Type Counts**

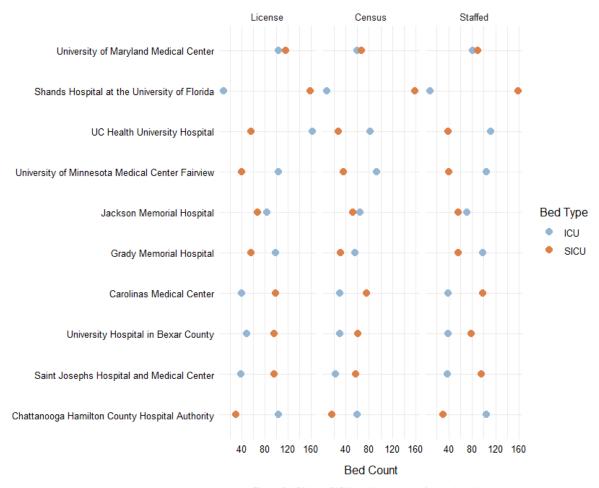
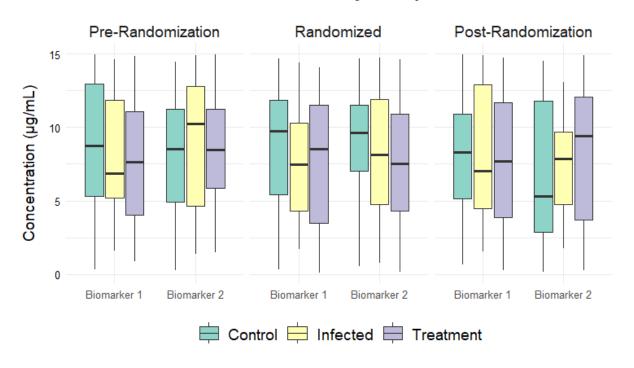


Figure 8: ICU and SICU bed type counts for top hospitals

### **Box Plots**

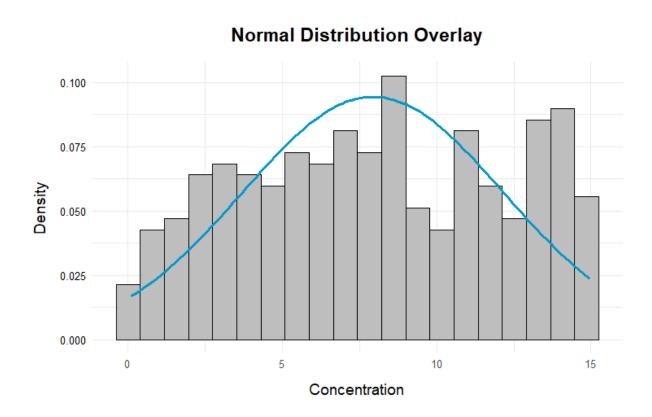
#### **Biomarker Concentrations**

## **Biomarker Concentrations by Group and Time Period**



## Histograms

### **Biomarker Concentration**



# Q-Q Plots

## Biomarker Concentration

