mguan999@gmail.com https://andmatt.github.io/

#### Education

# Bachelor of Science in Biology, Bachelor of Arts in Economics, Chemistry Minor, May 2015

University of North Carolina at Chapel Hill, Chapel Hill, NC

Cumulative GPA: 3.65 Economics Major GPA: 3.86

Activities: Resident Advisor, Undergraduate Research, Peer Tutor, Chemistry Mentor

Honors: Omicron Delta Epsilon, Buckley Public Service Scholar, Hayden B. Renwick Academic Achievement Award

#### **Skills Summary**

Python Apache Spark Apache Hadoop

Apache Hive SQL Tableau R Git Excel

SAS Data Engineering Predictive Modeling

Management Consulting Project Management

#### **Work Experience**

Valassis Digital 4/2018-Present

# **Marketing Science Engineer**

Develop and implement production level streams to automate the Marketing Science Team's workflow

- Act as the primary contributor to the Marketing Science codebase ensuring coding best practices across the team
- Design and populate backend tables (Hive and Postgres) to support data products across the Operations organization
- Build self-serve analytics tools for the larger Operations organization

*Valassis Digital* 1/2017-4/2018

## **Marketing Scientist**

- Set up and perform measurement studies for digital marketing campaigns
- Generate robust post-campaign insights using a variety of data sources (point of sale, panel, demographic, interest etc.)
- Develop python packages to streamline the workflows of the marketing science, and insights data analysis teams
- Build standardized, and dynamically populated tableau templates for use across multiple teams

Mu Sigma 9/2015-1/2017

### **Analytics Associate**

- Work with clients from two Fortune 100 companies to deliver scalable analytics solutions
- Manage and work alongside a team of data scientists in Bangalore to ensure high quality client deliverables
- Involved in the development and validation of two large scale statistical modeling projects
- Perform Ad Hoc analysis, reporting, data mapping, and database QC using SQL, Excel, and R
- · Plan and build dashboard visualizations in Tableau and Excel to facilitate insight generation

## Research Experience

Ko Lab UNC School of Dentistry

7/2012 - 5/2014

## **Undergraduate Researcher**

Performed MTS assays to quantify osteoblast and stem cell growth on Dr. Ko's biomaterial - GEMOSIL

## Ke Lab UNC Genetic Medicine Building

6/2013-8/2013

# **Summer Undergraduate Researcher**

- Performed docking of PDE5 and DAPE proteins with the Autodock software and analyzed docking results to determine favorable
  protein binding conformations and elucidate a reasonable binding mechanism.
- Contributed to Paper "Discovery of 3-(4-hydroxybenzyl)-1-(thiophen-2-yl)chromeno[2,3-c]pyrrol-9(2H)-one as a
  phosphodiesterase-5 inhibitor and its complex crystal structure"

Breese Lab Bowles Center for Alcohol Studies

7/2012-7/2013

#### **Undergraduate Research Assistant**

Performed immunohistochemistry assays on rat brain tissue to detect the impact of chronic alcohol exposure on c-Fos expres