

AVINASH ANAND AHUJA

505 S Race St, Urbana, IL-61801 ▪ Ph: (217) 819-9001 ▪ aaahuja2@illinois.edu ▪ <http://avinashahuja.me>

SUMMARY

I am passionate about Applied Data Science and solving problems in the areas of Open Governance and Data Access & Transparency. I have experience in applying **Machine Learning** and **NLP** to challenging and socially relevant problems.

EDUCATION

University of Illinois, Urbana-Champaign Illinois, USA

Master of Science in **Computer Science**

KDD 2016 – Student Travel Award

Master of Science in **Civil Engineering**

August 2015 – May 2017

GPA: 3.84/4.0

August 2013 - May 2015

GPA: 3.87/4.0

WORK EXPERIENCE

Data Science Intern, Anheuser-Busch InBev, Champaign IL

May 2016 – Present

- Applying **Active Learning** and **Hierarchical Clustering** to meld retailer data from multiple sources.
- Building a **forecasting model** and **recommendation engine** for businesses to optimize purchase quantities.

Summer Fellow, Data Science for Social Good (DSSG), University of Chicago

May 2015 – August 2015

- Applied **ML** and **NLP** to create metrics on dynamics of skills and jobs in the American economy.
- Collaborated with **government agencies** and **non-profits** to understand requirements and identify important metrics.
- Developed scalable **data processing pipeline** using **Spark** and **AWS**.

Senior Engineer, Larsen & Toubro (L&T), Modular Fabrication Yard, Oman

Sept. 2011 to July 2013

- Planned, executed and monitored **fabrication of Oil Rigs** (3000+ Tons).
- Designed and developed **automated report generation** systems.

PROJECTS

Object Detection and Tracking in 3D, University of Illinois

Spring 2016

- Almost real-time drone localization in 3D using consumer grade webcams.
- Improved detection using **SVM w/ hard negative mining**.

Automatic Extraction of Product Features and Sentiments from Amazon Reviews, University of Illinois

Fall 2015

- Experimented with supervised and **unsupervised ML** to identify key product features.
- Visualize feedback for designers using **Python + Django** to assist in improvement of product.

Identifying Skills Gap in Chicago's Labor Market, DSSG

Summer 2015

- Developed a **Data Driven approach** to analyze **skills gap** in Chicago's labor market.
- Prototyped a **scalable data pipeline** using AWS, PostgreSQL and Apache Spark and frontend with **Python + Flask**.

Predicting partners in International Trade Networks, University of Illinois

Fall 2014

- Applied **community detection** in International Trade network
- Trained **SVM** on existing trade agreements to predict future beneficial trade agreements.

3D Thermography using Kinect and Thermal camera, University of Illinois

Spring 2014

- Developed a prototype product to **generate 3D models** of buildings with temperature information.
- Aimed to improve **energy audit** of buildings, reduce environmental footprint and energy costs.

RELEVANT COURSES

- Machine Learning ▪ NLP ▪ Data Driven Design ▪ Computer Vision ▪ Algorithms ▪ Cloud Computing
- High Performance Computing ▪ Social and Economic Networks ▪ Optimization and Decision making

SOFTWARE SKILLS

- Languages : Python, Ruby, SQL, C/C++
- Packages : MATLAB, Mathematica, R, Primavera
- Frameworks/Libraries : Flask/Django, Rails, Hadoop/Hive, Spark

MEMBERSHIPS AND ACTIVITIES

Chapter President, Asha for Education, University of Illinois Chapter

Aug. 2015 – Present

Student Advisor, Centre for Innovation in Teaching & Learning (CITL), University of Illinois

Feb. 2015 – July 2015

Treasurer and Web Developer, Asha for Education, University of Illinois Chapter

Aug. 2014 – July 2015