Joseph Haaga

Developer & Data Engineer

14917 Emory Lane, 20853, Rockville, Maryland US

⌕ http://joehaaga.xyz   ✉ haaga.joe@gmail.com

▢ (240) 778-9695

○ josephhaaga   **in** joseph-haaga

SKILLS

Web Development

html | css | javascript | php | lamp stack |
mean stack | reactjs | nodejs | pimcore |
drupal 7/8 | wordpress | jquery | d3js |
cordova/phonegap | 508 compliance

Software Development

java | python | bash | perl | git | docker |
unit testing | tdd | oop |
functional programming | design patterns |
algorithmic analysis | rdbms | mysql/nosql

Data Science

r | python | pandas | numpy | nlp |
classification | regression/linear modeling |
clustering/unsupervised techniques |
sql/nosql | elasticsearch & logstash |
tableau | arcgis

WORK EXPERIENCE

Data Scientist at Tylor Data Services October 2018 - Current

http://tylordata.com/

TDS continues to deliver data science consulting, big data analytics, and custom computer programming services that are proven to address business challenges for government agencies, non-profit organizations and private corporations.

- Leading development of a graph analytics tool for fraud pattern detection in financial data graphs.

- Supporting research in applying novel deep learning techniques to elicit graph embeddings.

Data Scientist at Redhorse Corporation June 2018 - October 2018

https://redhorsecorp.com

Redhorse Corporation, a program management and technology services company, provides integrated solutions in environmental consulting, energy and climate change, information technology, and intelligence.

- Designed and implemented a image recognition application for environmental science use case.

- Experimented with different convolutional neural network architectures to maximize F1 score.

- Built custom sklearn Pipeline components to take advantage of OpenCV preprocessing techniques.

- Developed web-based utility resulting in a 10x decrease in time spent labelling training data.

Full Stack Developer at Grafik August 2016 - June 2018

https://grafik.agency

Grafik is a branding agency focused on crafting digital brands for B2B, B2C, Nonprofit and government clients worldwide.

- Led architecture and development of CMS-driven solutions for clients like Strayer & Global Automakers, using Drupal 8 and Pimcore 5.

- Contributed to the architecture and development of marketing websites for brands like Strayer, Ligado, Politico, Merritt Clubs, JBG and EYA. Developed on Drupal 7, Pimcore 4/5, and Wordpress.

- Drastically reduced development timelines by building internal tools to streamline internal processes (structured QA spreadsheet with Slackbot integration to close developer-designer feedback loop and closely track live performance/completeness metrics). Built using Google Apps Script, Google Sheets, and Slack Webhooks.

- Delivered customer persona insights by applying data mining & visualization techniques to client CRM & transactional data. Performed analysis using Tableau and Anaconda toolkit (Seaborn, Pandas, NumPy).

Lead Architect at GWU Data Science Institute November 2017 - May 2018

https://gwu.edu

Selected to be a founding member of GWU's DSI, aiding in bootstrapping the institute as well as supporting technical initiatives.

- Led deployment efforts in standing up a cloud-hosted information sharing environment for Virginia state agencies, alongside ODNI and AWS

- Mentored students in Data Warehousing classes, providing guidance on their semester projects

Developer at Gray Street Solutions May 2015 - July 2016

https://graystreetsolutions.com

Gray Street Solutions is a boutique, digital-first creative agency, founded on the principle of bringing a "Fearlessly Agile" approach to online communications consulting, open-source web development, and social media campaign management.

- Led development of a cross-platform mobile application to track a brand's social media campaigns, using Apache Cordova and Adobe PhoneGap.
- Developed and maintained digital presences for a variety of trade organizations, defense companies, and nonprofit clients. Developed on Wordpress and maintained on WPEngine managed hosting.

Jr. Solutioneer at Eastport Analytics May 2014 - August 2014

https://www.eastportanalytics.com/

Eastport Analytics is an analytics consulting group applying advanced analytics to uncover valuable insights and drive measurably better mission outcomes.

- Developed automated spreadsheet parsers in Java 7.
- Merged GIS shapefiles with political ad spend data to determine campaign efficacy in Designated Market Areas.

Developer at @HomeRehab May 2013 - April 2014

https://gust.com/companies/homerehab

@HomeRehab designs exercise devices and software to improve the continuum of care related to falls among the aging population.

- Prototyped IoT orthopedic rehabilitative device on Arduino hardware in a dialect of C.
- Developed games to be played with the device to aid in gamification of proprioceptive rehabilitation exercises.
- Implement wireless modules (XBee), LCD screens, & various sensors/actuators within I/O constraints of a development board.

VOLUNTEER

Coordinator & Volunteer at Grafik Gives

August 2017 - Current

https://grafik.agency

Introduce potential initiatives and coordinate CSR events.

- Raised >$1000 for AIGA, providing scholarships for underrepresented design students in the DC area.
- Developed spreadsheet solution for long-term initiative planning, enabling tracking of the organization's impact on local, regional, and national levels.

Kitchen Volunteer at So Others Might Eat

April 2011 - Current

Serving meals to marginalized people in the DMV area.

EDUCATION

M.Sc. Computer Science at Georgia Tech

2019 - Current

Major courses: graduate intro to operating systems

M.Sc. Data Science at The George Washington University

2017 - 2018

Major courses: data science | data warehousing | data mining | visualization of complex data | machine learning i | machine learning ii | time series analysis | cloud computing | bayesian methods | member of graduate consulting club | member of mba business analytics club | president of ms data science student council

Grade: 3.92

B.Sc. Computer Science at The George Washington University

2012 - 2017

Major courses: circuit theory | bioinformatics | algorithms | software engineering | database systems | systems architecture | operating systems | machine learning | systems programming | artificial intelligence algorithms | statistical nlp | deepquest ibm watson (essentially a supplement to stat. nlp)