RAHUL NATH

Cell: (516)-491-9232 | Email: rahul.nath.eph@gmail.com | Website: http://rahul-nath.github.io

Education

Williams College, Williamstown, MA — *Computer Science and Economics; B.A., 2015*
Glen Cove High School, Glen Cove, NY — *Valedictorian of the Class of 2011*

Experience

Honors Senior Research – Williams College

"Learning Domain Models from Partially Observed Action Sequences" — *Sept. 2014 – Dec. 2014*

- Leveraged Selenium, NLTK (text mining), multiprocessing, and WEKA to extend the LOCM knowledge engineering algorithm to learn domain models from sparse descriptions of action sequences in a single agent setting *(Python)*

Student Contractor -- Naval Research Laboratory/Knexus Research, Washington DC *July 2014 – Sept. 2014*

- Reduced prepositional and word-sense ambiguity in interpreted speech using contextual information in conjunction with Naïve Bayes, Yarowsky's algorithm, and other semi-supervised machine learning techniques *(Lisp, Python)*
- Accelerated and improved accuracy of abductive reasoning for autonomous agents by using a weighted Markov Logic Network as a constraint solver, facilitating goal-driven autonomy for the agent *(Python)*
- Co-authoring paper, "Learning Action Models in a Multi-Agent Context", with Matthew Molineaux (Knexus Research) and David Aha (NRL), detailing results of research for the Autonomous Squad Member project (ASM)

Software Engineering Intern – Mobiquity Inc, Wellesley, MA *May 2014 – July 2014*

- Integrated cutting edge technology like iBeacons, Google Glass, and Raspberry PIs into Android apps *(Java)*
- Solidified server-client interactions between devices for Mobiquity's deltaIQ™ platform *(Node.js, Java)*
- Conceptualized the UX, UI, and business logic for prototype applications in the Innovations Lab (R & D)
- Utilized Amazon Web Services (EC2, DynamoDB, S3, Kinesis, and Cognito)

Teaching Assistant – Williams College Computer Science Department *Sept. 2013 – Sept. 2014*

- CSCI 136: Data Structures and Advanced Programming
- Instructed and graded students on lab problems regarding data structures and advanced programming methods

Software Researcher Intern – Middlebury Interactive Languages, Middlebury, VT *June 2013 – August 2013*

- Utilized CMU Sphinx4 to develop a speech recognition plugin for company's language learning software *(Java)*
- Debugged products and documented improvements to the technology and business approach

Student Technology Consultant – Office of Informational Technology, Williams College *Sept. 2012 – Present*

- Diagnosed and solved software problems affecting the Williams College student community

Programming, Software, and Language Expertise

- **Main Languages**: Python | Java | C | Lisp
- **Experience in**: Ruby on Rails | Android App Dev | x86/ARM Assembly | Unix/Bash | Scala | ML
- **Skilled with:** STATA | R statistical software | LaTeX | Node.js | HTML/CSS | Git | AWS
- Amazon Web Services Business Professional Accreditation
- Bengali *(Fluent: S)*, Spanish *(Beginner: R, W, S)*, French *(Beginner: R, W, S)*

Activities, Leadership, and Academic Accomplishments

- Dean's List at Williams College
- Class of 1960's Economics Scholar
- Conceptualized annual "Pay it Ephward Silent Auction" event.
  Over $3000 raised since inception. Proceeds go to the Berkshire Food Project

- Co-Founder and President, Williams Strength Club — *2014 – present*
- Developer, Williams Student Online Executive Board — *2013 – present*
- The Williams Octet (a cappella group) — *2013 – present*
- Webmaster, WCFM Radio Executive Board — *2012 – present*