Sarah Morin

822 25th Street NW, Washington, DC 20037
sarahmorin@gwu.edu | 603.998.6402

SKILLS

PROGRAMMING

Java • Python • C
SQL • Assembly • LaTeX
HTML • PHP • MATLAB

OPERATING SYSTEMS

Linux • Windows

LANGUAGES

English (Native)
Spanish (Advanced)

COURSEWORK

Operating Systems
Foundations of Computing
Algorithms
Continuous Algorithms
Number Theory
Systems Programming
Database Systems
Software Engineering
Computer Architecture
Discrete Structures I & II

AWARDS

2019
Steve and Shelly Heller Prize
Clare Booth Luce Scholar

PROJECTS

R2B2 Audit Tool Python
Multivariate Hypergeometric Distribution Sampling Tool Python
Mutexes and Futexes (xv6 OS) C
Course Registration System MySQL, HTML, PHP, CSS
Encryption/Decryption with Caesar Cipher/OTP LC3 Assembly
Search Engine (Text Files) C
Chat Room Java

LINKS

Github:// **sarahmorin**
LinkedIn:// **Sarah Morin**

EDUCATION

THE GEORGE WASHINGTON UNIVERSITY

BS in Computer Science, Minor in Mathematics
School of Engineering and Applied Science
Expected May 2021 | Washington, DC
GPA: 3.87 / 4.0

DIGITAL FORENSICS AND CYBER SECURITY PROGRAM

Pre-College Program | Champlain College
July 2016 | Leahy center for Digital Investigation

- Learned basic cyber security and digital forensics skills such as computer and network security and vulnerability exploitation.
- Used state of the art technologies including TCPDump, Wireshark, and NMAP.

PUBLICATIONS

PEER-REVIEWED CONFERENCE PAPERS

1 Sarah Morin, Grant McClearn, Neal McBurnett, Poorvi Vora, Filip Zagórski, "A Note on Risk-Limiting Bayesian Polling Audits for Two-Candidate Elections", 5th Workshop on Advances in Secure Electronic Voting, A Workshop Associated with Financial Crypto 2020, *Voting 2020*.

POSTERS

Grant McClearn, Sarah Morin, Neal McBurnett, Poorvi L. Vora, Filip Zagórski, "A New Statistical Audit for Real Elections"

- Honorable mention for poster presentation at SEAS R&D Showcase 2019.
- Presented at NSF Undergraduate track in the Secure and Trustworthy Cyberspace biennial PI meeting, 2019.

RESEARCH

R2B2 | Undergraduate Researcher

Professor Poorvi Vora | Dept. of Computer Science
September 2019 - Present | The George Washington University
Developed open source library to execute risk-limiting ballot polling audits including a Bayesian approach and a convolution approach.

RESEARCH EXPERIENCE FOR UNDERGRADUATES | Scholarship

January 2019 - Present
Funeded by NSF Awards 1421373 and 2015253.

BAYESIAN RISK LIMITING AUDITS | Undergraduate Researcher

Professor Poorvi Vora | Dept. of Computer Science
March 2019 - September 2019 | The George Washington University
Simulated Bayesian risk-limiting ballot polling audits on elections with invalid votes and multiple candidate elections.

EXPERIENCE

THE GEORGE WASHINGTON UNIVERSITY | Teaching Assistant

Jan. 2019 - Present | Washington, DC

CSCI 3410	Systems Programming	Spring 2020
CSCI 2461	Computer Architecture	Fall 2019, Fall 2020
CSCI 1311	Discrete Structures I	Spring 2019