

# SHAWN CRAHEN

North Andover, MA • (978) 992-6523 • [shawn.j.crahen@gmail.com](mailto:shawn.j.crahen@gmail.com) • [linkedin.com/in/shawnjcrahen](https://www.linkedin.com/in/shawnjcrahen) • [shawncrahen.com](https://shawncrahen.com)

Recent Computer Science graduate with well-established military leadership, management, and mentoring experience, seeking to leverage analytical, technical, and programming skills to bring value and make a deep positive impact as a software engineer.

## Work Experience

### United States Coast Guard

April 2002 to Present

- Advanced to the highest enlisted rank, Master Chief Petty Officer (E-9), 8 years ahead of professional growth point; earned #1 score on service-wide examination at 3 different pay grades (2013, 2016, 2019)
- Earned highest possible Boat Forces certification as Surfman (2007) and assigned #392 in the Surf Register. Held numerous other boat forces and law enforcement certifications.
- Led one of only nineteen surf stations in the U.S. as Officer in Charge (2018-2022), capable of operating in extreme weather conditions including storm force winds and 30-ft seas.
- Supervised staff of 40 active duty and auxiliary personnel, in the execution of over 350 high-risk search and rescue and law enforcement missions annually; saved ~75 lives and preserved ~\$1.25M maritime property annually
- Aligned unit with strategic service goals and inspired team to achieve; led to 25% increase in operations, 75% increase in fisheries enforcement, and highest enforcement violation rate (22%) in New England
- Represented boat stations on selective national advisory council (2018-2021); influenced service-wide policy reforms which improved workforce management and reduced operational risk
- Collaborated with global construction company to develop safety policy/procedures for over-the-water construction staff (2017); developed and implemented PPE/MISHAP response plan and tested plan with joint agency drills
- Trained/certified Federal, State, and Local partner agencies in maritime operations; resulted in 3x increase in operational capabilities in area of responsibility
- Directed maintenance of \$25 million in real property assets and \$5 million in small boat assets
- Designed/implemented training, professional development, indoctrination, and education programs for 80 active duty, reserve, and auxiliary personnel (2013-2017); increased unit qualifications by 40% and developed unit-wide expertise in electronic navigation systems, search and rescue, law enforcement, and operational risk management. Certified personnel in boat forces and law enforcement competencies.
- Championed Leadership and Diversity Advisory Council (Chair) (2013-2017); held widely attended, monthly leadership workshops; crafted inclusive culture

## Software Projects

### Weather Dashboard - [github.com/wx-dashboard](https://github.com/wx-dashboard) (In progress...)

- Constructing weather dashboard tailored to the needs of Coast Guard surf stations
- Ongoing development: REST API, Spring Security, data generation to feed ML predictions, deploy with AWS
- Technologies Used: Spring, Thymeleaf, H2, HTML, CSS, Java

### Personal Portfolio - [shawncrahen.com](https://shawncrahen.com) (January 2022)

- Constructed personal portfolio web site to showcase projects; deployed with AWS Route 53 & S3
- Created serverless contact form to receive contact emails using AWS API Gateway, Lambda, & SES
- Technologies Used: JavaScript, HTML, CSS, Amazon Web Services, VS Code

### BigCalculator - [github.com/big-calculator](https://github.com/big-calculator) (Project Manager/Design Lead, Software Engineering course project 2021)

- Led three-member, remote team to develop Windows calculator application capable of calculations with up to 100-digit precision
- Designed and implemented app using model-view-presenter architecture
- Technologies Used: Java, JUnit, MVP Architecture, Git/GitHub, UML, Google Drive, Discord

## Certifications

- AWS Certified Cloud Practitioner, Amazon Web Services Jan 2022

## Education

- M.S. Computer Science, University of Illinois - Springfield Dec 2021
- B.S. Environmental Science, American Military University Feb 2018

## Languages and Technologies

- Languages: Java, Python, SQL, C, JavaScript, HTML, CSS
- Technologies: Amazon Web Services, Spring Framework, Hibernate, NoSQL, Git/GitHub, Eclipse, VS Code, Vim
- Other: Cloud Computing, Machine Learning, Data Mining, Data Structures & Algorithms