Cyber Smart Career Spotlight

BY ACTUA

MICHAEL BANKS

Cybersecurity Engineering Manager for Amazon Web Services (AWS)

In today's world, there are many devices connected to the internet. When something unexpected happens or when devices need updating, it is my job to detect, respond and ensure they get fixed to make sure they work how they are supposed to. I like to explain to people that I am the equivalent of a firefighter in the cybersecurity realm and that the purpose of my role is to be on the frontline response when cybersecurity incidents occur. Just as it is important for people to build computers and software that connect to the internet, it's important to develop and implement the appropriate security mechanisms and tools to monitor and protect these computers and software. My role and my team of cybersecurity engineers are important because when something unintended happens, we are responsible for ensuring a quick and efficient fix to security issues.

actüa

Cyber Smart Career Spotlight

BY ACTUA

œ

つつ

Ш

S

œ

Ш

m

>



BANKS

Describe your career path:

With over a decade of cybersecurity experience, I have worked in positions ranging from cybersecurity consultant to cybersecurity engineer. I have had a passion for computers since the first grade. Whenever I had the chance, I found a way to play on my mom's computers. I then began to learn more about computers by exploring their settings and eventually diving deep into the subsystems that most people hardly ever interact with. In high school I started to like math and other technology, which made pursuing a STEM degree (Science, Technology, Engineering, Math) make sense in college. I completed a Bachelor of Science degree in information technology with a concentration in cybersecurity. I went on to complete a Master of Science degree in cybersecurity management. Through tinkering with computers as a hobby and pure curiosity in exploring the internet in the early 2000s, I started learning how to code in a computer programming language (Python), use Linux and even build websites. This had a positive impact on me going into the technology field.

What challenges have you faced and overcome in your career?

Computers and technology have greatly evolved over the last decades to a point where they help solve real-life challenges. But communicating and interacting with people is a challenge I had to overcome and one that a computer couldn't help me with. There have been times when I needed to communicate through writing with customers and leaders. Understanding what people wanted from me in terms of actions and assignments was challenging starting out. I overcame this challenge by asking a lot more questions on what was expected of me and what "right" looked like. One of the biggest skills I developed was translating cybersecurity and computer concepts to people that were not familiar with computers or cybersecurity.

What advice would you give youth about their future career paths?

The first piece of advice is to enhance your writing game and make sure you keep it up! All organizations write reports, articles, documentation and you will never get out of it. The second piece of advice is to learn as much as you can around the fundamental principles in the field of your choice. The final piece of advice is to get as much experience as you can before you graduate from college whether it is from personal projects, research, patents, work studies or projects. Also, youth should know that there are unique jobs out there where you can do what you love in this field. For example, I love to travel. When I worked as a consultant investigating cybersecurity, I travelled 100 out of the 365 days in a calendar year. It was amazing to visit so many new places.

Why does diversity and representation in cybersecurity matter?

It is important to make diversity a priority in any space because that's how we grow as people and learn new things. There are a couple of organizations that I am a part of, founded and even continue as a member today. One includes Amazon's Black Employee Network (BEN). BEN is an affinity group that focuses on the overall experience and representation of Black employees at Amazon. I founded BEN's Washington, D.C. chapter and served on the global board representing thousands of black Amazonians.