

The background of the slide is a dark, high-contrast image of a circuit board. A central integrated circuit (chip) is visible, with numerous fine lines representing traces and connections radiating outwards. The overall aesthetic is technical and digital.

My Cybersecurity Career Path and Guidance for Yours

MARIA BROWN

OWASP PHOENIX MEETUP

APRIL 2024

Topics



My Experience.. With Tips for You

15 Minutes



Cybersecurity Career Resources

3 Minutes



Where Are You Starting At?

5 Minutes



Applying for Cyber Jobs Advise

1 Minute



Cyber Career – Long-Term Success Tips

1 Minute

Career Path



Jacoby & Meyers
PERSONAL INJURY ATTORNEYS

Receptionist

Schoen & Smith, Ltd.
Chicago, IL

Legal Secretary



Hostess



Crab
Seller



ASU Arizona State
University

Computer Systems Engineer



MOTOROLA



Gateway Systems Engineer

Kimley»Horn

Traffic Systems Engineer

Medtronic

17 Years
Until 2017

Principal Software Engineer

Medtronic

Sr. Principal
Application Security Engineer

7 Years
2017 - Now

How I Transitioned Careers in 2 Years

1. Community Groups
2. Industry Conferences
3. Image Re-branding
4. Self-Guided Learning
5. Hands-On Learning
6. Industry Certifications



Community Groups

My Community Groups

- OWASP Meetup

Local Meetup Groups



OWASP Phoenix Chapter
<https://www.meetup.com/owasp-phoenix-chapter>



We Protect PHX
<https://www.meetup.com/we-protect-phx>



EVSec Community
<https://www.meetup.com/evsec>
[Event April 4](#)

Nowhere near a complete list!

Remote Meetup Groups

Largest Cybersecurity groups

1 FutureGPT: AI/ML, Cyber Security, Blockchain, AR/VR & IoT

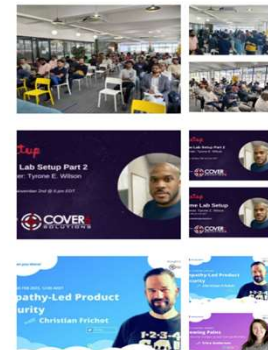
17,761 Innovators | Bangalore, India
Organized by Nayyan Mujadiya

2 D.C. Cybersecurity Professionals

10,225 CyberWarriors | Arlington, USA
Organized by Tyrone E. Wilson

3 OWASP DevSlop Project

6,733 Members | Ottawa, Canada
Organized by OWASP® Foundation



<https://www.meetup.com/topics/cybersecurity>

Industry Conferences

My Conferences

- OWASP AppSec California
- OWASP App Sec USA
- Blackhat / Defcon
- Cactus Con

Local Conferences



CactusCon

Career Village

<https://infosec-conferences.com/us-state/arizona>

Nationwide and Regional Conferences



Nowhere near a complete list!

Image Re-Branding

Cybersecurity Help



Help friends and neighbors
with security reviews

Blog Posts



Write blog posts as you learn
new stuff

Public Speaking



Speak at community groups as
you learn topics

Tell Everyone



Present yourself as a person
pursuing cybersecurity

My Re-Branding

- Company profile
- Security forum postings
- Business security review – Sister's Office

"Don't compare your beginning to someone else's middle."

Self-Guided Learning

My Learning Tools

- Pluralsight Skill Builder
- OWASP Podcasts

Learning Tools



PLURALSIGHT

<https://www.pluralsight.com>

CYBRARY

<https://www.cybrary.it>

Cybersec Videos



@DEFCONConference

@CactusCon

@OWASPGLOBAL

SecurityTube

<http://www.securitytube.net>

Industry News

DARK
Reading

<https://www.darkreading.com>

The Hacker News

<https://thehackernews.com>

Nowhere near a complete list!

Hands On Learning

Skill Practice Platforms



<https://tryhackme.com>



<https://www.hackthebox.com>

<https://github.com/joe-shenouda/awesome-cyber-skills>

My Hands On Learning

- CactusCon Root The Box CTF

Certifications

My Certifications (self-funded)

- 2015 - CISSP - Associate Certified Information Systems Security Professional
- 2016 - CEH – Certified Ethical Hacker
- 2017 - CES – Certified Encryption Specialist
- 2017 - CCSK – Certificate of Cloud Security Knowledge

Entry Level Skill Certifications



Entry Level Cloud Certifications



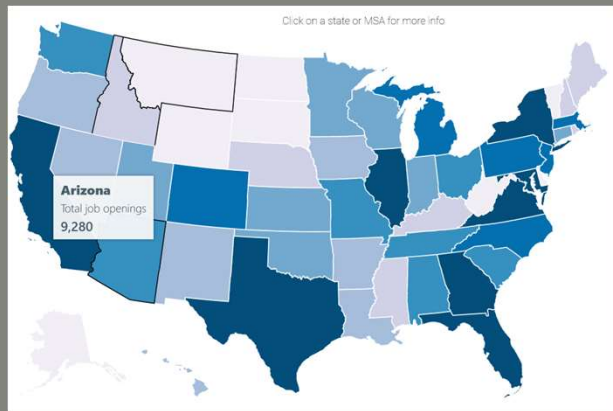
Mid-Career Certification



**Certified
Information
Systems Security
Professional**

Nowhere near a complete list!

Cybersecurity Certification Heat Map



CERTIFICATION HOLDERS / OPENINGS REQUESTING CERTIFICATION ⓘ

■ Certification holders

■ Openings requesting certification

Certified Information
Systems Security
Professional (CISSP)

66,011

CompTIA Security+

63,345

Certified Information
Systems Auditor (CISA)

42,927

Global Information
Assurance Certification
(GIAC)

34,092

Certified Information
Security Manager (CISM)

31,585

<https://www.cyberseek.org/heatmap.html>

Cybersecurity Career Resources



General Public

Federal Employees

High School
Students

NICCS®

General Public

The National Initiative for Cybersecurity Careers and Studies (NICCS) website is the premier online resource for cybersecurity **training**, **education**, and **career** information. NICCS connects government employees, students, educators, and industry with cybersecurity resources and training providers throughout the Nation.

<https://niccs.cisa.gov>

Federal Virtual Training Environment (FedVTE)

- Federal government employees and contractors
- State, Local, Tribal, and Territorial (SLTT) government employees
- U.S. military personnel and Veterans
- General public

Government + Public

<https://niccs.cisa.gov/education-training/federal-virtual-training-environment-fedvte>



High School Students

The **AZ Cyber Initiative** is dedicated to unlocking opportunities for young people who are interested in cyber and emergent technology. We collaborate with workforce partners across the state to offer programs including **bootcamps**, **internships**, and **mentorships**.

<https://azcyber.org>

Women



WiCyS has professional and student **communities, professional development programs, mentor/mentee programs**, virtual and in-person **conferences/career fairs, Job Board++**, **resources**, and **events** for women in cybersecurity and their supporters.

<https://www.wicys.org/wicys-phoenix-az>



Women's Society of Cyberjutsu (WSC) mission is to advance women in cybersecurity careers by providing programs and partnerships that promote **hands-on training, networking, education, mentoring, resource-sharing and other professional opportunities**.

<https://womenscyberjutsu.org>



Women's Cyber Academy

An intensive, accelerated training program that provides SANS world-class **training and GIAC certifications** to quickly and effectively launch careers in cybersecurity. SANS Cyber Academies are 100% scholarship-based, at **no cost to participants**.

<https://www.sans.org/cyber-academy/womens-academy>

Veterans

NICCS®

Cybersecurity for Veterans

To help Veterans enter this rewarding career field, CISA provides **Cybersecurity Training and Education for Veterans**: A **user guide** for those who formerly served in the U.S. Armed Forces. This guide includes a variety of **tools** and **resources** to help Veterans begin a career in cybersecurity including **free online training** and **certification prep courses**, information on cybersecurity-related degree programs and **scholarships**, and much more.

<https://niccs.cisa.gov/education-training/cybersecurity-veterans>

NIST
National Institute of
Standards and Technology
U.S. Department of Commerce

Career
Preparation and
Educational
Topics

Federal
Resources for
Veteran Job
Seekers

Non-Profit
Resources

<https://www.nist.gov/itl/applied-cybersecurity/nice/resources/veteran-resources>

Underrepresented



Minorities in Cybersecurity

Minorities in Cybersecurity (MiC) – our mission to provide **practical knowledge, training, development, and support** to our members with the sole purpose of preparing them to become the next generation of global cybersecurity leaders.

<https://www.mincybsec.org>



The IOBSE is dedicated to providing quality security and management **focused educational programs**. These programs are designed to serve members at all career levels from students to practitioners to senior executives.

<https://iobse.org>



To achieve the consistent representation of women, underrepresented communities, and all veterans in the cybersecurity industry through programs including **career exploration, mentorship, and community** designed to diversify, educate, and empower.

<https://www.cyversity.org>

<https://www.cyberdegrees.org/resources/cybersecurity-resources-for-underrepresented-populations>

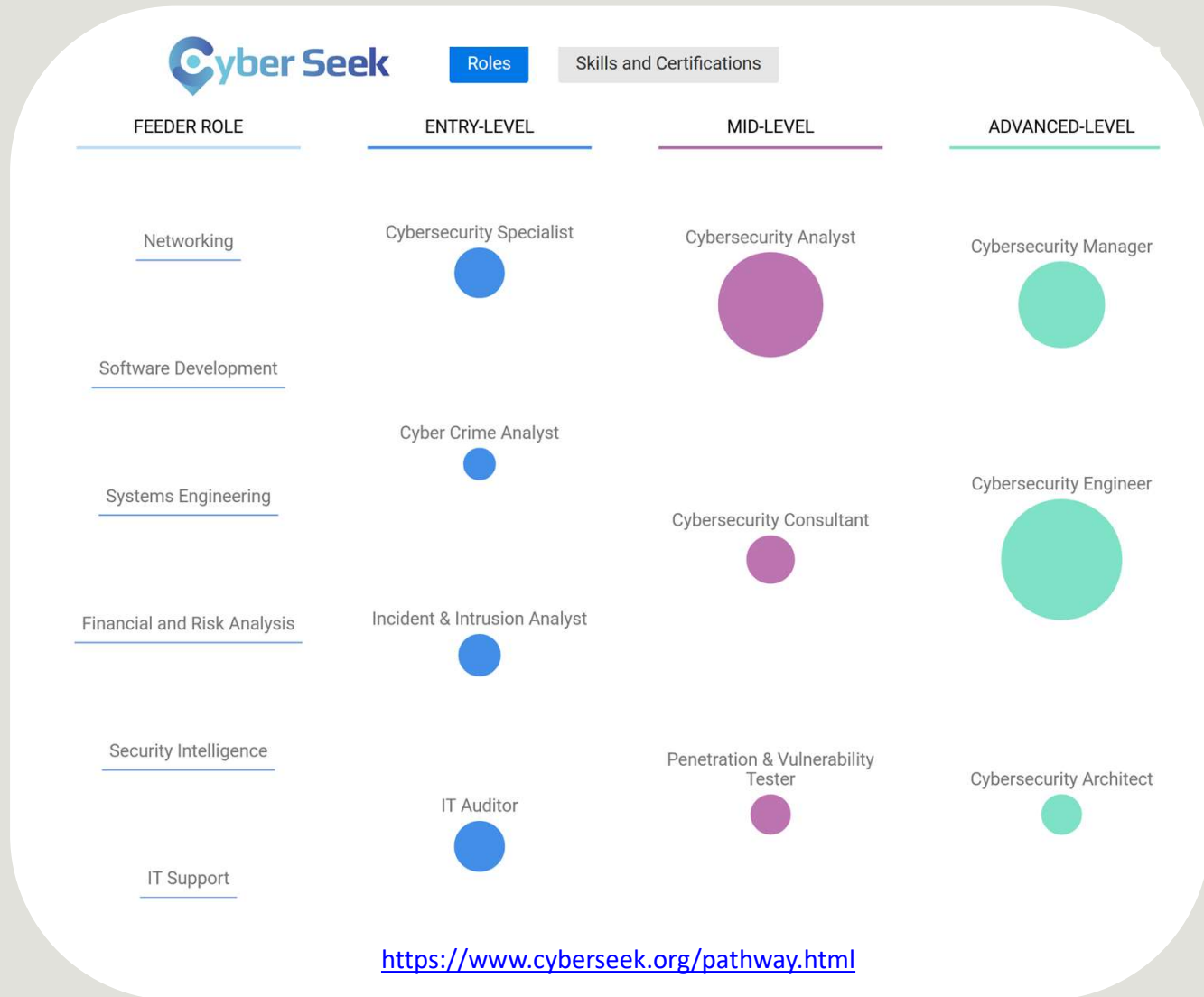
Where are You Starting At?

CAREER



IT Industry

Cybersecurity Career Pathways



Non-IT to Cybersecurity



InfoSec Sherpa

Tracy Maleeff (@InfosecSherpa) was a professional law Librarian and at the top of her game. Looking for change and meaning, she searched until she found the field of Information Security.

<https://www.gettingintoinfosec.com/videos/infosecsherpa-from-travel-agent-to-law-librarian-to-security-analyst>

GETTING INTO INFOSEC

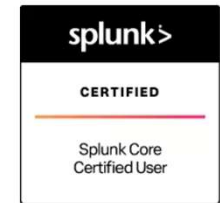
Podcast with unique stories of **how people got jobs in Information Security** (aka cybersecurity). Hear stories of **librarians, hair dressers, mechanics, and more** finding their path into the security field!

https://www.youtube.com/channel/UCg6gV_gdfc188HZdN8LUx4A

Breaking Into Cybersecurity Key Skills and Certifications

Security Analyst

Certifications



Core Skills and Hands On Learning



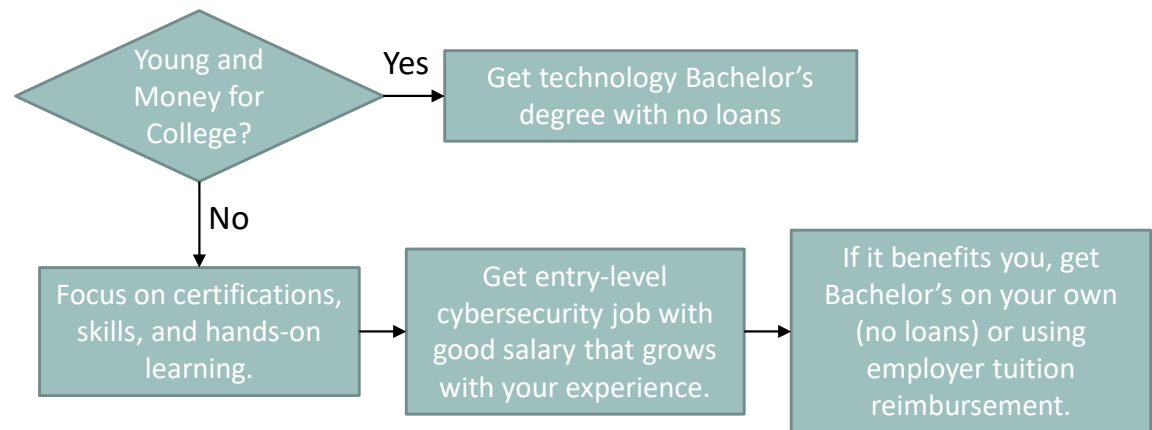
Sources:

[Federal Cyber Defense Skilling Academy - Cyber Defense Analyst Skills](#)

[BowTiedCyber Cybersecurity Career Roadmap](#)

No College Degree

Degree Recommendation Flowchart



Highly Affordable, High Quality Bachelor's Degree

Phoenix College - Bachelor's of Applied Science in Information Technology

Students will be prepared to pursue a variety of occupations within the IT industry, such as Network or Database Administrators, IT Project Managers or Systems Analysts, and Cyber Security Specialists.

<https://www.maricopa.edu/degrees-certificates/bachelors-degrees/information-technology-bas>

Applying for Cyber Jobs

Resume



1 Page Resume
Application Tracking Software
(ATS) friendly

Job Applications



Lots of Applications 1K++
In Person Whenever Possible

Top Platforms

Linked in

indeed



ZipRecruiter

Disconnects

When employers want 10 years of
experience before you turn 20



Entry-Level jobs asking for CISSP and
Bachelor's Degree

Cybersecurity Career

Keys to Long-Term Success

Keep Learning



Industry Trends
Advanced Certifications

Share Ideas



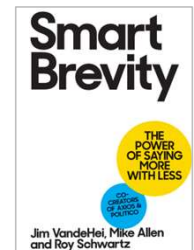
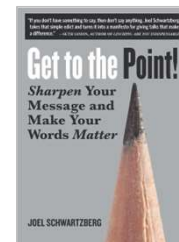
Share What You Know

Mentor and Encourage



Help Others at Every Opportunity

Communication Skills



Make All Your Communications
High Quality

Thank You For Your Time!

maria.brown@owasp.org

www.linkedin.com/in/mariabrown

Presentation At:

<https://tinyurl.com/mbrown999>

