UNIVERSITY OF NORTHWESTERN ST. PAUL
CAREER & LEADERSHIP DEVELOPMENT

What can I do with a major in CYBERSECURITY & INFORMATION SYSTEMS

The Cybersecurity and Information Systems major is designed to give the student the tools needed to develop and oversee the implementation of information security procedures and policies. Build, maintain and upgrade security technology, such as firewalls, for the safe use of computer networks and the transmission and retrieval of information. Design and implement appropriate security controls to identify vulnerabilities and protect digital files and electronic infrastructures. Monitor and respond to computer security breaches, viruses, and intrusions, and perform forensic investigation. Also, oversee the assessment of information security systems.

What Type of Work are Related to this Degree?

- Digital forensics specialist
- Computer network defense analyst
- Exploitation analyst
- Cyber network engineer
- Cybersecurity analyst
- Penetration testing specialist
- Incident response analyst
- Intrusion detection analyst
- DevSecOps engineer
- Security auditor

Who Employs People with this Degree?

- Government (Federal, State, and County)
- National Security Agency
- Department of Homeland Security
- Federal Bureau of Investigation
- Software Development firms
- Healthcare organizations
- Telecommunications firms
- Cybersecurity consulting firms
- Financial services companies
- Internet-related companies

More information at ONETonline.org

General Strategies for Success:

- Professionals in cybersecurity must focus on details and strive to clearly communicate both orally and in writing.
- Expect to be a lifelong learner. New technology and various challenges demand constant learning. Expect to update your skills frequently.
- Be prepared to study during your free time using a variety of online sources and tools.
- Expect to keep yourself up to date through reading information from a variety of sources and discussing what you have learned with colleagues.
- Be willing to seek out advice and insights from colleagues. Acknowledge your need to learn more.
- Stay current with events in the news that relate to cybersecurity in various domains including government, healthcare, financial services, technology firms, etc.
- After gaining a few years of work experience, consider developing a cybersecurity specialization.
- Expect to attend cybersecurity conferences and be prepared to share the challenges you have faced in your career.

Professional Associations

IEEE Computer Society
Association of Computing Machinery
American Society for Information Science and Technology
Cloud Security Alliance
Internet Security Alliance
Information Systems Security Association
National Cybersecurity Student Association

This information represents possible occupations and strategies for careers with this major. As with any job or career, there may be additional qualifications or experience needed. For more information and options, make an appointment with Career & Leadership Development or check out our online resources on our website or on theROCK, Career & Leadership Development tab.