# **ETSU Computing Information**

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# Why Choose ETSU Computing?

ETSU's Computing Department offers a comprehensive range of programs designed to prepare you for a successful career in today's rapidly evolving technology landscape. As the #1 Best College for Computer Information Systems in Tennessee (CollegeFactual.com) and the #2 Best Computer and Information Sciences College in Tennessee (Universities.com, 2021), ETSU delivers exceptional value and quality in computing education.

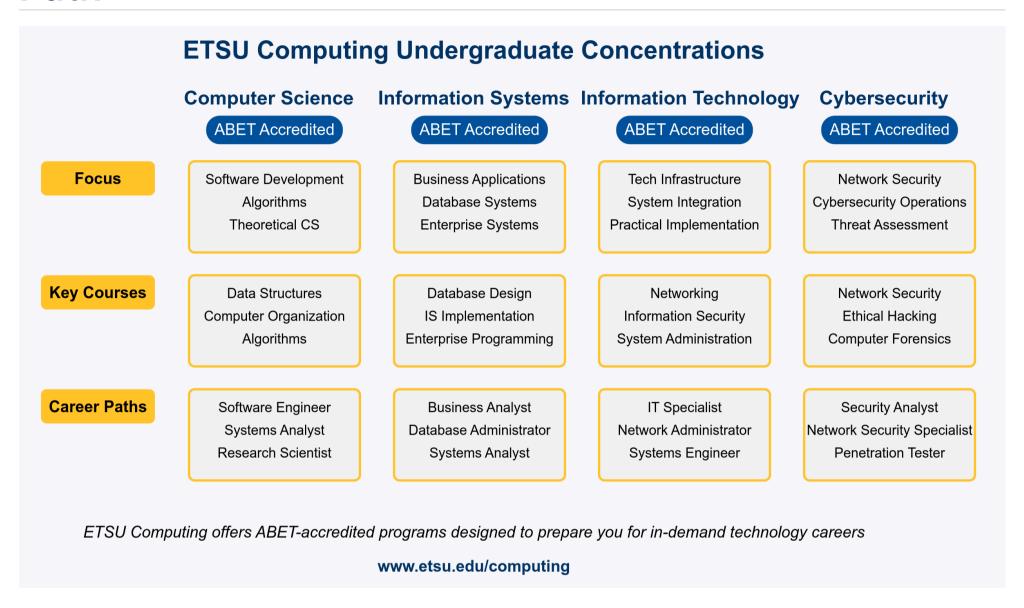
# Rich History & Industry-Recognized Excellence

Since 1972, the ETSU Department of Computing has evolved alongside the technology industry, maintaining a perfect balance between contemporary technical skills and foundational theory. Four of our undergraduate computing programs are accredited by the Computing Accreditation Commission of ABET, confirming that ETSU's programs meet the rigorous standards expected by industry and academia:

• B.S. in Computing with a Concentration in Computer Science

- B.S. in Computing with a Concentration in Information Systems
- B.S. in Computing with a Concentration in Information Technology
- B.S. in Computing with a Concentration in Cybersecurity & Modern Networks

# Undergraduate Concentrations: Find Your Perfect Path



ETSU Computing offers four distinct undergraduate concentrations, each designed to prepare you for specific career paths:

# **Computer Science (CS)**

The CS concentration positions you at the heart of systems-level software programs with a curriculum based in mathematics and modern software engineering.

- Focus: Software development, algorithms, data structures, theoretical computer science
- Key Courses: Data Structures, Computer Organization, Algorithms, Programming Languages
- Career Paths: Software engineer, systems analyst, programmer, research scientist
- Strengths: Strong mathematical foundation and technical depth for software engineering careers

### **Information Systems (IS)**

IS is the bridge between computing and business. As a member of the SAP University Alliances program, our courses get hands-on with SAP, the premier enterprise system at the heart of 89 percent of Fortune 500 companies. You'll also get hands-on with Salesforce, the top Customer Relationship Management (CRM) system central to many organizations' workflows, including ETSU's!

- Focus: Business applications, database systems, enterprise information systems
- Key Courses: Database Design, Information Systems Implementation, Enterprise Programming
- Career Paths: Business analyst, database administrator, systems analyst
- Special Feature: Choose between Accountancy or Management emphasis

# **Information Technology (IT)**

IT provides broad exposure to the design, implementation, governance and security within information systems. Get hands-on with web development, computer security, and database and system implementation.

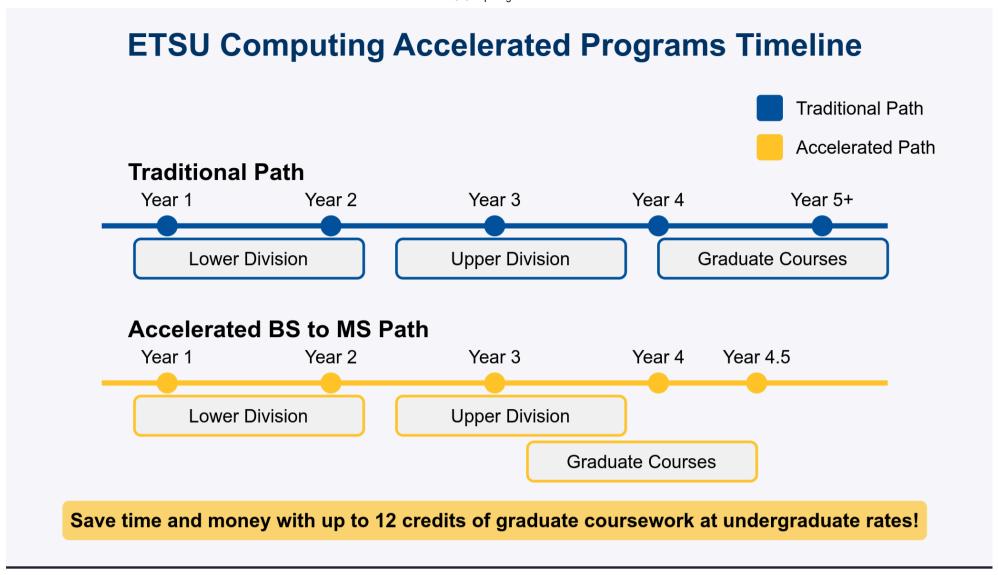
- Focus: Technology infrastructure, system integration, practical implementation
- Key Courses: Networking, Information Security, System Administration
- Career Paths: IT specialist, network administrator, systems engineer
- Strengths: Hands-on technical skills for immediate workplace application

# **Cybersecurity and Modern Networks**

Cybersecurity & Modern Networks provides a comprehensive exploration of modern cybersecurity and networking-enabled application development. Get hands-on with secure software development, systems deployment, cloud, wireless, mobile, and sensor-based computing.

- Focus: Network security, cybersecurity operations, threat assessment
- Key Courses: Network Security, Ethical Hacking, Computer Forensics, Risk Management
- Career Paths: Security analyst, network security specialist, penetration tester
- Strengths: Specialized training in high-demand cybersecurity skills

# **Accelerated Programs: Fast-Track Your Career**



### Accelerated B.S. to M.S. Program

Get a head start on your graduate education:

- Take up to 12 credits of graduate coursework during your final undergraduate year
- Pay undergraduate tuition rates for graduate courses
- Complete your Master's degree approximately one semester earlier
- Eligibility: 75+ undergraduate credits completed with minimum 3.25 GPA

### **BlueSky Tennessee Institute**

A groundbreaking partnership between ETSU and BlueCross BlueShield of Tennessee:

- Earn a B.S. in Computing with Information Systems concentration in just over two years
- Classes held at BlueCross campus in Downtown Chattanooga
- Build a professional portfolio throughout the program
- Opportunity to receive job offer from BlueCross upon graduation
- Special focus on recruiting high-potential students from Hamilton County's most challenged high schools

# **Exceptional Financial Support**

# **ETSU Computing Scholarships and Financial Support**

### **Exceptional Financial Support for Students**

Multiple funding sources available to make your education affordable

#### **Undergraduate Scholarships**

#### **Honors In Discipline**

- Full tuition waiver
- · Based on academic achievement
- Renewable for qualifying students

#### **STEM Community Outreach**

- · Waive out-of-state tuition
- For new out-of-state and international students

#### **Transfer Student Scholarships**

- Available for students with 3.0+ GPA
- Helps make transition to ETSU affordable



#### **Graduate Financial Support**

#### **Graduate Assistantships**

- Teaching positions
- · Research positions
- For full-time graduate students

#### **Graduate Tuition Scholarships**

- Merit-based awards
- Partial and full tuition waivers
- · Based on academic performance

#### **Additional Support**

- College of Business and Technology
- ETSU Honors College
- · Department of Computing



#### ETSU offers outstanding scholarship opportunities:

- Honors In Discipline scholarships: Full tuition waiver for qualifying recipients
- STEM Community Outreach scholarships: Waive out-of-state tuition for new out-of-state and international students
- Transfer Student scholarships: Available for students with college GPA of at least 3.0
- Graduate Assistantships: Teaching and Research positions available for full-time graduate students

### **Academic Performance Scholarships (APS)**

- Available for both freshman and transfer students.
- The largest merit-based scholarship program for new freshmen from TN and border counties eligible for state tuition.
- Scholarship is subject to renewal if requirements (min. GPA & credit hours) are met.
- View APS details at: etsu.edu/financial-aid-and-scholarships/scholarships/aps

#### **APS for Freshmen**

Name	Amount (annual)	Min GPA	Min ACT/SAT
Presidential	\$5,000	3.9	30/1360
Provost	\$4,000	3.5	27/1260
Deans	\$3,000	3.5	26/1230

Name	Amount (annual)	Min GPA	Min ACT/SAT
Faculty	\$2,000	3.5	25/1200
Faculty	\$2,000	4.0	22/1100

#### **APS for Transfer Students**

Name	Amount (annual)	Min GPA	Min Prior Credit Hours
Summit	\$3,000	3.5	24
Elevate	\$1,500	3.0	24

### State-of-the-Art Facilities & Resources

- Five specialized teaching and research laboratories
- Professional software access through Microsoft Azure Dev Tools and VMWare VMap
- Flexible learning options with evening courses and online/hybrid formats for working professionals

# **Vibrant Student Community**

- Association for Computing Machinery (ACM): Guest speakers, competitions, and help sessions
- ETSU Cybersecurity Club: Participates in competitions like Cyberforce and CCDC
- Women in Tech: Provides resources, mentorship, and professional development

# **Career Outcomes: Where ETSU Graduates Excel**

# **ETSU Computing Career Outcomes**

#### **Technology Career Pathways for ETSU Computing Graduates**

#### **Software Development**

Software Engineer

Full-Stack Developer

Mobile App Developer

DevOps Engineer

Software Architect

\$70,000 - \$140,000+

#### Data & Al

Data Scientist

Machine Learning Engineer

Business Intelligence Analyst

Data Engineer

Al Researcher

\$75,000 - \$150,000+

#### Cybersecurity

Security Analyst

Penetration Tester

Security Engineer

Cybersecurity Consultant

**CISO** 

\$80,000 - \$160,000+

### Top Employers of ETSU Computing Graduates

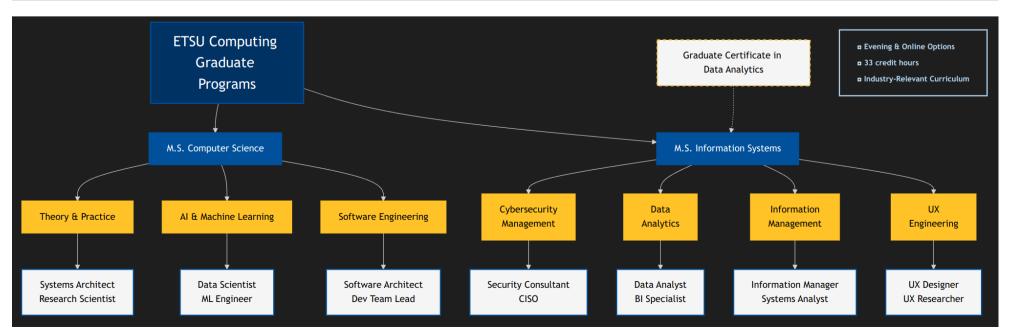
Technology Companies Google, Microsoft, IBM Healthcare
BlueCross BlueShield, HCA

Government & Finance Federal Agencies, Banks

ETSU Computing graduates are prepared for high-demand careers such as:

- Data Scientist
- Machine Learning Engineer
- Cybersecurity Consultant
- Software Development Engineer
- Information Systems Manager
- User Experience Designer
- And many more technology leadership roles

# Graduate Programs: Advance Your Expertise



# M.S. in Computer Science (33 credit hours)

All students take core courses in Software Project Management and Research Methods in Computer Science, then choose one of three concentrations:

- CS Theory & Practice Concentration: Focus on distributed systems, artificial intelligence, networking, and algorithms
- AI & Machine Learning Concentration: Specialize in computational aspects of AI and ML algorithm design
- Software Engineering Concentration: Gain in-depth experience in the software development lifecycle

# M.S. in Information Systems (33 credit hours)

All students take core courses in Software Project Management, Research Methods, and Enterprise Information Systems, then choose one of four concentrations:

- Cybersecurity Management Concentration: Learn to defend physical and virtual information assets
- Data Analytics Concentration: Master managing, manipulating, and presenting data for business advantages
- Information Management Concentration: Manage information assets with a healthcare perspective
- User Experience Engineering Concentration: Develop effective and usable interfaces

# **Graduate Certificate in Data Analytics (12 credit hours)**

- Quick credential focused on data analytics skills
- No prior computing background required
- Credits can count toward M.S. in Information Systems
- Ideal for professionals wanting to add data skills to their resume

# **Real-World Experience: Capstone Projects**

Both graduate programs offer a choice of capstone experiences:

- Independent Project: Complete a project under an advisor's mentorship
- Group Software Development Project: Work in a team to develop a complete software product
- Research Thesis: Research a topic and present findings to advisor and committee members

# Ready to Join ETSU Computing?

Whether you're a first-year student, transfer student, international student, or working professional seeking an advanced degree, ETSU Computing welcomes you to visit (in-person or virtually), ask questions, and discover why we're ranked #1 in Tennessee.

For more information about applying to programs, scholarships, or to arrange a visit, contact the department directly at 464 Nicks Hall or through our website.