

# **Eshan Shrestha**

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## **EDUCATION**

**Texas Tech University, Lubbock, Texas**  
Bachelor of Science in Computer Science  
Honors: Dean's List (Spring 2023 – Fall 2025)

**Expected Graduation Date: Spring 2027**  
Cumulative GPA: 3.93

## **EXPERIENCE**

### **Texas Tech University, Lubbock, TX**

**Undergraduate Researcher – Whitacre College of Engineering** **Present - December 2025**

- Conducted research on post-tornado residential damage assessment using deep learning as part of the GMRE Lab, contributing to a research paper on automated damage evaluation.
- Implemented and modified convolutional neural network models, including U-Net and CLIP-based architectures, working with model structures, training workflows, and PyTorch.
- Built supervised semantic regression models to identify damage severity and affected areas in residential buildings using labeled image datasets, incorporating CUDA-based optimizations to improve training efficiency.

**Undergraduate Grading Assistant – Whitacre College of Engineering** **Present - August 2025**

- Evaluated C programming lab assignments by reviewing, testing, and debugging student code for correctness, efficiency, and adherence to coding standards.
- Designed Data Structures curricula and assessments, including labs and rubrics covering recursion, pointers, linked lists, dynamic memory management, and ADTs.
- Supported course delivery by proctoring exams, providing structured feedback, and ensuring grading consistency across large student groups.

**Student Analyst – IT Help Central**

**August 2025 - June 2025**

- Provided first-line technical support for campus systems, diagnosing and resolving hardware, software, and network-related issues while maintaining compliance with FERPA standard.
- Utilized ticketing systems, remote desktop tools, and IT documentation practices to streamline issue tracking and resolution.
- Applied structured troubleshooting methodologies across diverse applications, collaborating with senior analysts on escalations, and producing clear documentation to ensure resolution

## **PROJECTS**

### **Database Management System**

- Built a RESTful API with Node.js, Express, and MongoDB that featured JWT-based authentication, role-based authorization, and account workflows including email verification.
- Implemented full CRUD operations, integrated Nodemailer for automated emails, enforced input validation, and managed secure file uploads tied to users and products.
- Prototyped a React front-end and connected it to the API, enabling account creation, login, and inventory management, while demonstrating full-stack functionality and real-world usability.

## **SKILLS**

- Certifications:** Google Cybersecurity Professional (SIEM/SOAR, NIST CSF, Incident Response), Deerwalk Inst. MERN Stack Development
- Security:** Threat Analysis (MITRE ATT&CK), Vulnerability Triage, Network & Infrastructure Security, Linux/Unix
- Engineering:** Python (Automation & Scripting), SQL (Data Auditing), JavaScript, Java, C, Git, Docker
- Specialized:** Computer Vision (U-Net, CLIP), CUDA, Local LLM Inference, Cryptography Fundamentals

