Ishan Kocherlakota

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A creative, visionary, and fervently passionate Mechanical Engineering (Aerospace Emphasis) student with interests in design and implementation for both the entertainment and engineering fields, alongside experience in modeling/designing.

Education:

- **University of California, Merced** | Undergraduate Mechanical Engineering w/ Aerospace Emphasis
  - Dean's Honor List
- **New York University, Stern** | Summer Program
- **Las Positas College** | Alternative Credit

Experience:

- **Graffix (FuturEntertainment, Melior Industries) / The GFM Group** | Designer, Engineer
  September 2017 - PRESENT
  - Worked with dozens of people to create new and innovative projects, ranging from next-level entertainment to proprietary tech across two subsidiaries and their multiple divisions
- **Algorized** | Engineering Intern
  September 2026 - PRESENT
  - Performed data collection utilizing partner equipment (WiFi, UWB and mmWave radars, time of flight, RGB/depth image cameras for ground truth) and proprietary software
  - Etc…
- **UCM Aerospace** | Engineer, Economic Analyst
  January 2026 - PRESENT
  - Designing and manufacturing a multi-sectioned flapping wing UAV with an integrated locking glide mechanism as part of a 4-person cross-functional team
- **Tutor.com** | Intermediate Tutor
  January 2026 - PRESENT
  - Providing one-on-one academic tutoring to students
- **Dublin Robotics Club** | Tutor, Volunteer, and Team Member
  January 2021 - December 2021
  - Assisted in teaching students for building VEX robots, and also participated on the VEX AI team
  - Worked on a patent regarding wildfires called the FALCON system with a group of people, focusing particularly on the technology utilized as well as the layout designs
  - Received the Excellence Award at the first annual VEX AI world championship, and achieved 3rd place overall

Skills:

- **CS/IT:** Visual Studio Code (JavaScript, Python, MATLAB, C++), Cybersecurity, Web Development
- **AI Tools:** LM Studio, OpenCode, Cline, Ollama, Pinokio, Claude (Code)
- **3D-CAD/3D-Printing:** SolidWorks, Autodesk Inventor, Ultimaker Cura

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- **Game Development:** Unreal Engine, ROBLOX Studio
- **Video/Photo Editing:** DaVinci Resolve, Affinity
- **3D-Modeling, Animation, Motion Capture:** Blender, Autodesk Maya, Rokoko, Mocap Fusion, MetaHuman Creator, DAZ, etc.
- **Audio Design:** FL Studio, Ableton

Projects:

GFM-related:

- Sourced bare NVIDIA parts to assemble custom GPU hardware for on-premise ML inference technology with no cloud dependency.
- Developed multiple different proprietary tools.

Project: Uni (UNITED):

- A planned anthology experience consisting of five episodes. Currently in pre-production; developing concept content and running case studies (R&D).

FALCON System patent:

- An autonomous fire mitigation system which leverages infrared sensors and sprinklers in order to detect and combat wildfires efficiently, notifying nearby fire brigades if a fire is confirmed.

ME137 - Computer Aided Engineering:

- Gained knowledge regarding the utilization of SolidWorks in order to model 3D parts and assemble them together.

Awards & Certifications:

- Excellence Award (VEX AI World Championship 2021)
- UC Merced Dean's Honor List
- Epic Games Game Design Professional Certificate (Coursera)