

KEVIN XILAI TANG

4037 Mesa Rd, Irvine, CA 92617

☎ (949)-795-8620 ✉ tangkx@uci.edu [in linkedin.com/in/kevin-xilai-tang](https://www.linkedin.com/in/kevin-xilai-tang)

Education

UC Irvine

Bachelor of Science in Aerospace Engineering

September 2025 – Present

Irvine, CA, USA

Relevant Courses: MATLAB, Calculus 1, 2, and 3, Classical Physics.

Projects and Outside Experiences

SRAD Solid Propellant Rocket - Barions

January 2021 – August 2022

Personal Project

Sao Paulo, SP, Brazil

- Designed, built, and launched a high-power solid propellant rocket using an SRAD motor and KNSB propellant.
- Achieved an apogee of 3,000 m using an M1848 class motor and aerodynamic design.
- Developed structural components, integrated propulsion systems, however, a recovery system failure resulted in ballistic descent.

Picosatellite Mission - GalaxtSat-1

August 2021 – January 2026

Personal Project

Brazil and India

- Designed and built a PocketQube standard satellite for a Sun-synchronous orbit mission to study lightning formation.
- Integrated subsystems for structure, payload, and ground communications.
- Iterated design for system integration and testing prior to launch on an ISRO PSLV-C62 rocket.

Liquid Bi-Propellant Rocket - Graviton

August 2022 – Present

Personal Project

Sao Paulo, SP, Brazil

- Designed and built a liquid bi-propellant rocket using nitrous oxide (N₂O) and ethanol (C₂H₆O).
- Using a 3,000 N engine for propulsion using a shower head injector.
- The rocket is in testing and validation phase.

L1 Certification Rocket

February 2026 – April 2026

Personal Project

Irvine, CA, USA

- Designed and built a high-power rocket to gain an Level 1 certification using an H219T-14A motor.
- Launched the rocket to reach 1,000 m apogee and recovered, with the condition to fly again.

Rocket Nose Cone Generator Code - MATLAB

February 2026

Personal Project

Irvine, CA, USA

- Developed a MATLAB code to generate parametric rocket nose cone geometries for ogive, von karman, and conical.
- Automated generation of DXF files and exported directly to Autodesk Fusion and SolidWorks for CAD modeling.

Autonomous Drone

August 2023 – October 2023

Project Manager, Group Leader, and Test Pilot

Sao Paulo, SP, Brazil

- Led design and manufacturing of an autonomous cargo drone prototype for Mars exploration missions.
- Managed team operations, flight testing, and system integration for autonomous and manual flight modes.

Activities and Leadership

UCI D1 Men's Tennis

January 2026 - Present

Team Manager and Stringer

Irvine, CA, USA

- Assist and support in the practices, the matches, and string rackets for the team.

AIAA Board Member

May 2026 - Present

Finance Officer

Irvine, CA, USA

- Organize finance, and sponsorship.

Tennis Player

July 2014 - Present

Competitive Tennis Player

Brazil and USA

- Won the PTT Wildcard and the Over 18 Paulista Federation Tournament.

Skills and Languages

Skills: 3D printing, Autodesk Fusion, MATLAB, OpenRocket, C++, Arduino IDE, Python, Arduino, STM32, Microsoft Office, BOM, PCB Design, PCB Component Soldering, Composite Lamination, Manufacturing.

Languages: English (fluent), Portuguese (native), Mandarin (native), Spanish (intermediate).

Awards and Achievements

Awards and Achievements: Published 2 Scientific Papers in IAC2024, 3 gold medals National Astronautical and Astronautics Olympiad, 2 Asteroids (2021-TX56 and 2021-NW20) Discoveries - NASA and Pan-STARRS, National Medal of Merit Honor by Brazil Government, managing personal stock portfolio since 15 years old