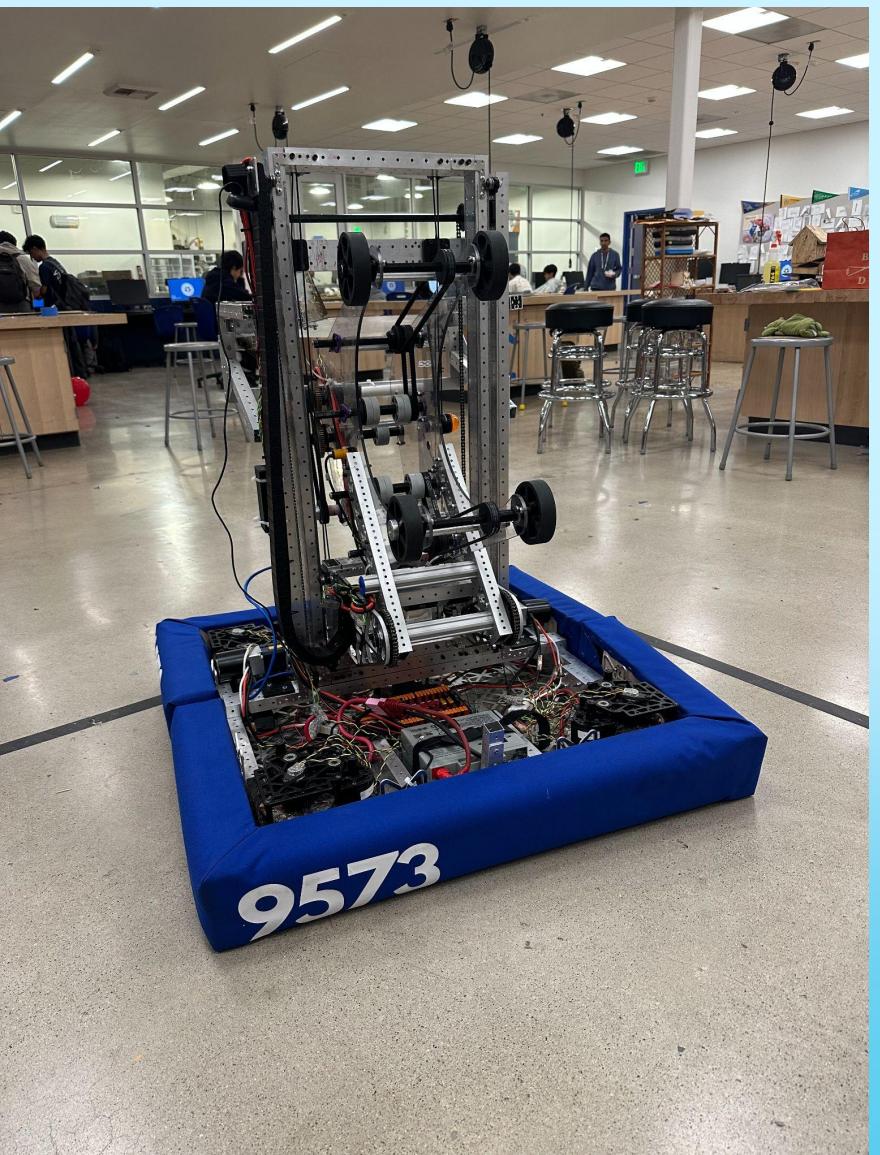
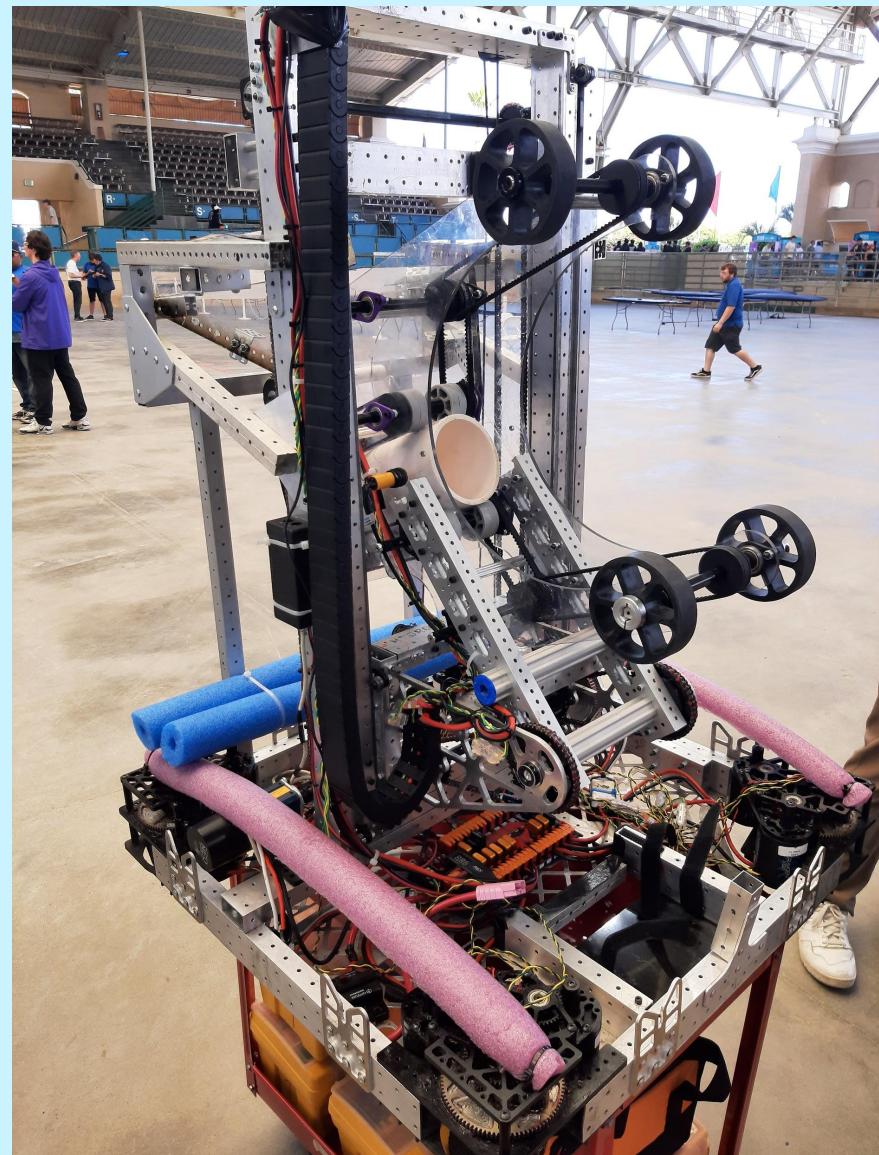


MMHS Robotics Club

Introduction Presentation • 2025-2026



Who are we?

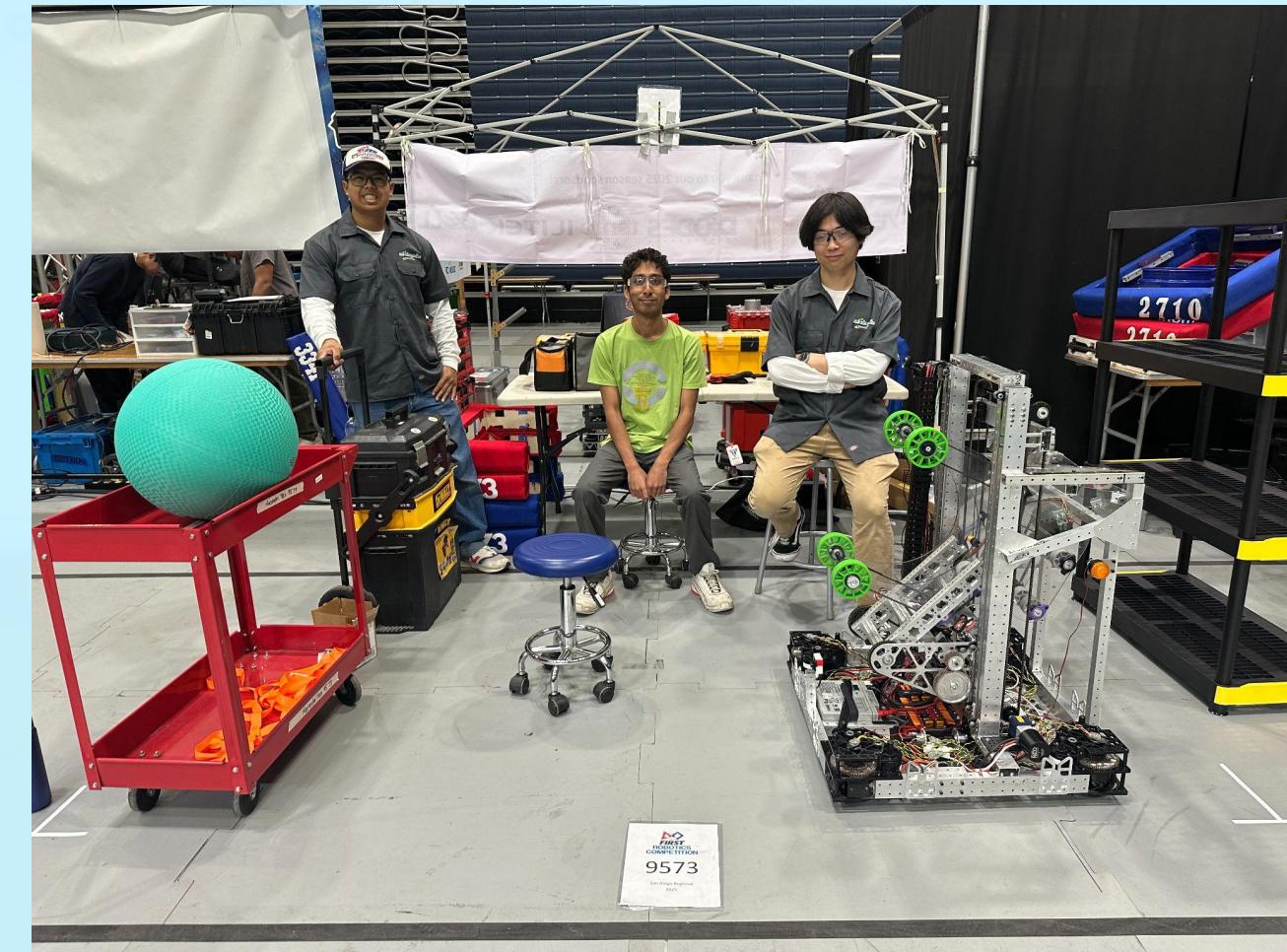
- MarauderTech 9573, FIRST Robotics Competition team at Mira Mesa High School
- Founded in 2023
- Team of ~30 students
- Part of the MMHS engineering



What is FIRST Robotics Competition?

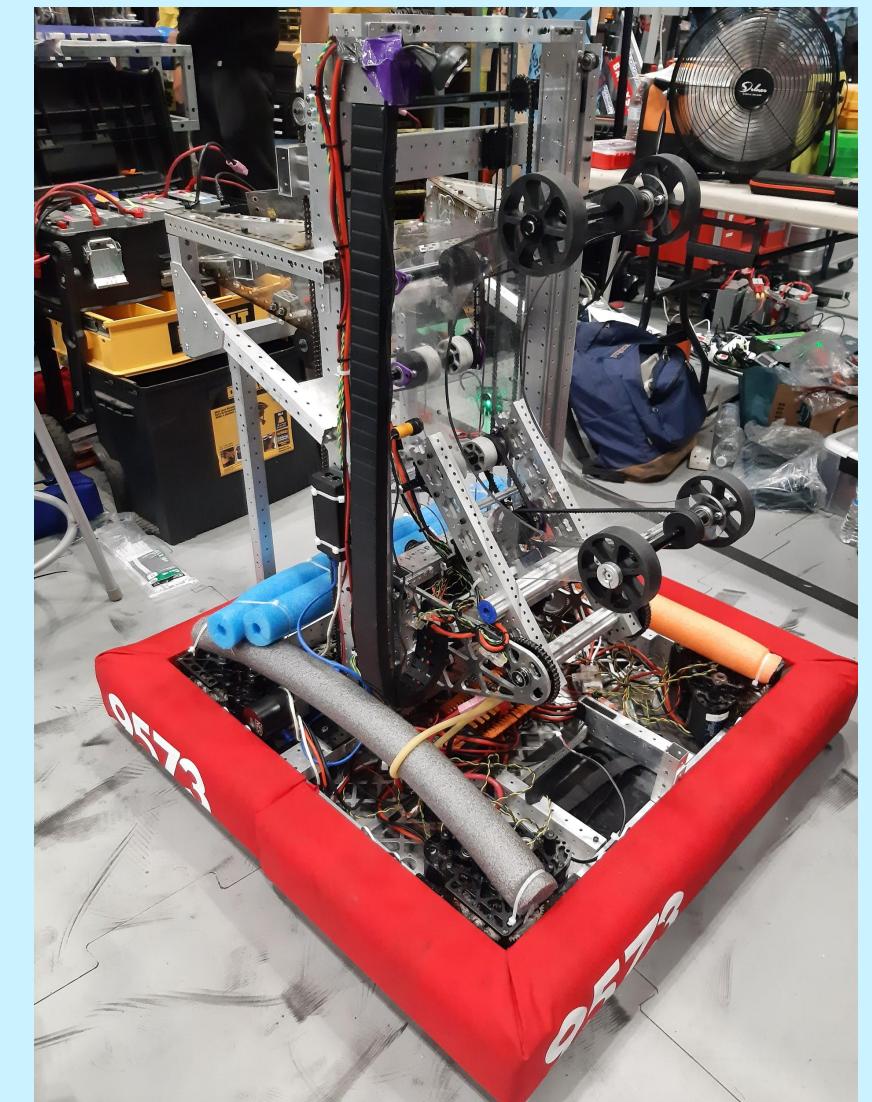
FIRST Robotics Competition (FRC) is a global challenge where high schools have six weeks to design, build, and program a robot to compete in a themed challenge.

FRC combines the spirit of sports with science and technology, and allows you to have fun while having real-world engineering experience! **No prior experience required.**



Our current robot

- Marlin, fit to play to play the 2025 Reefscape game
- Omnidirectional drivetrain, elevator, intake, outtake system
- Custom designed manipulator to pick up game pieces
- Entirely designed, manufactured, wired, and programmed by MMHS students in two months



Why join?

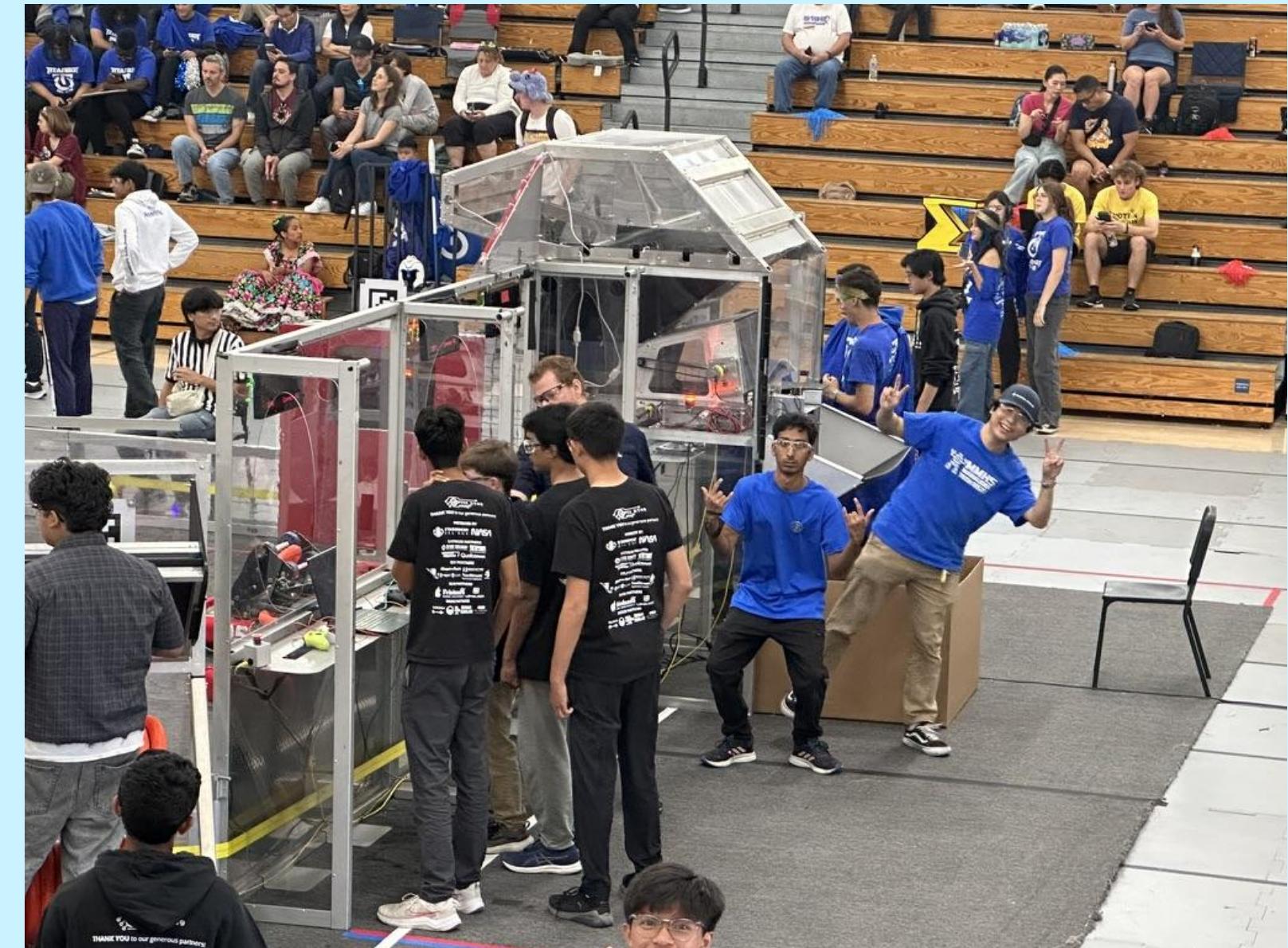
- Looks great for college and job applications!
- Build your soft skills like teamwork, communication, and leadership
- Have fun building a robot from scratch, participating in exciting competitions, and in team bonding events.
- Be active in the community with outreach events
- FRC specific scholarships
- Get to network with students and teams from different schools, states or even countries



By the numbers

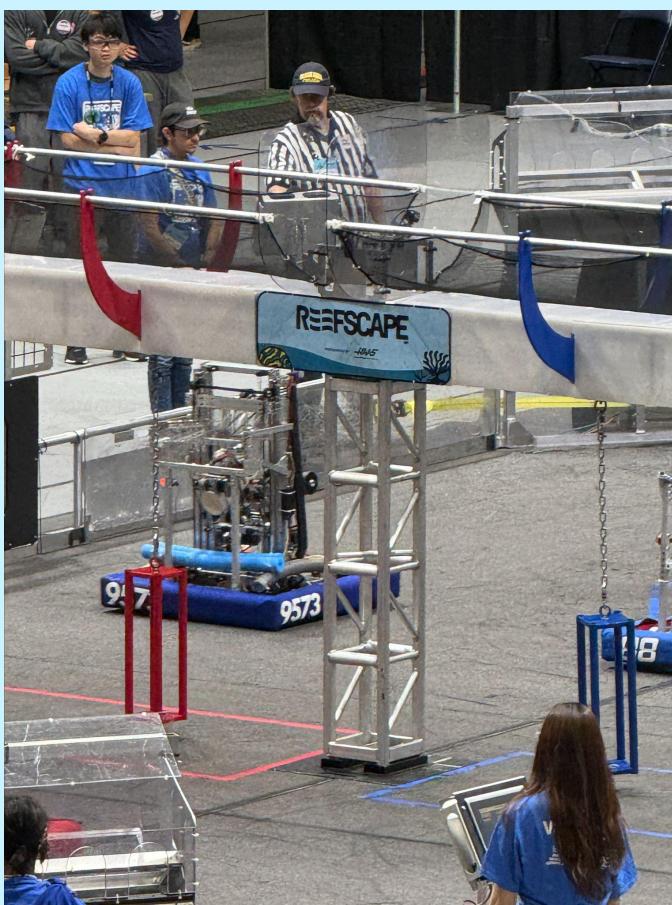
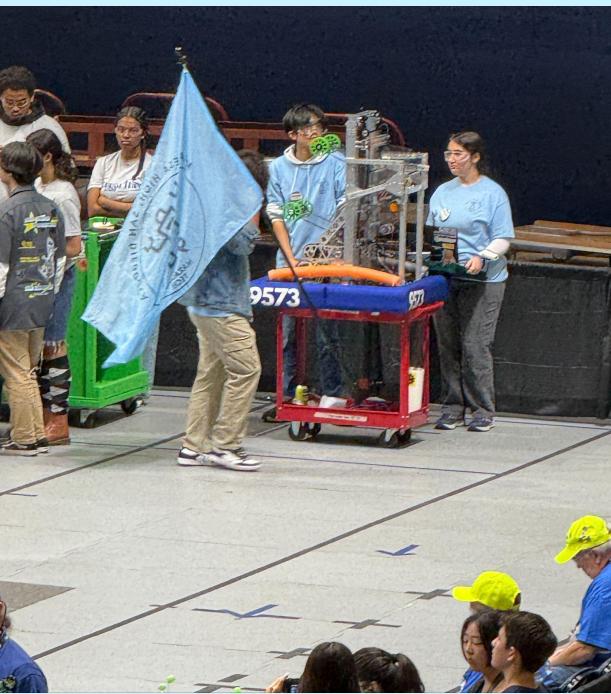
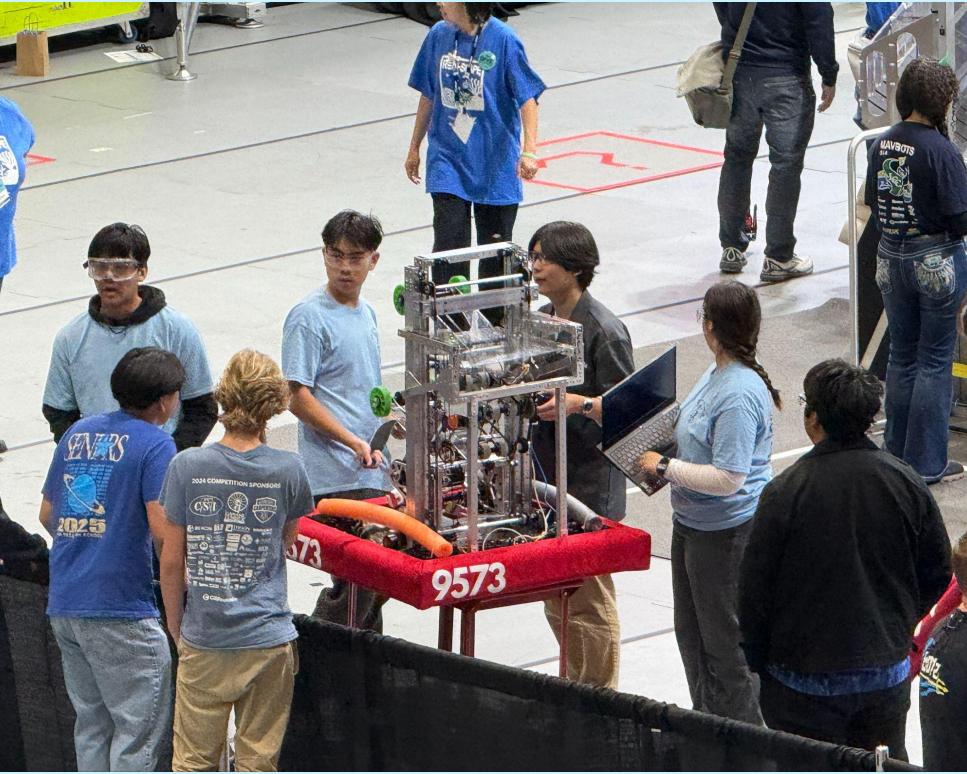
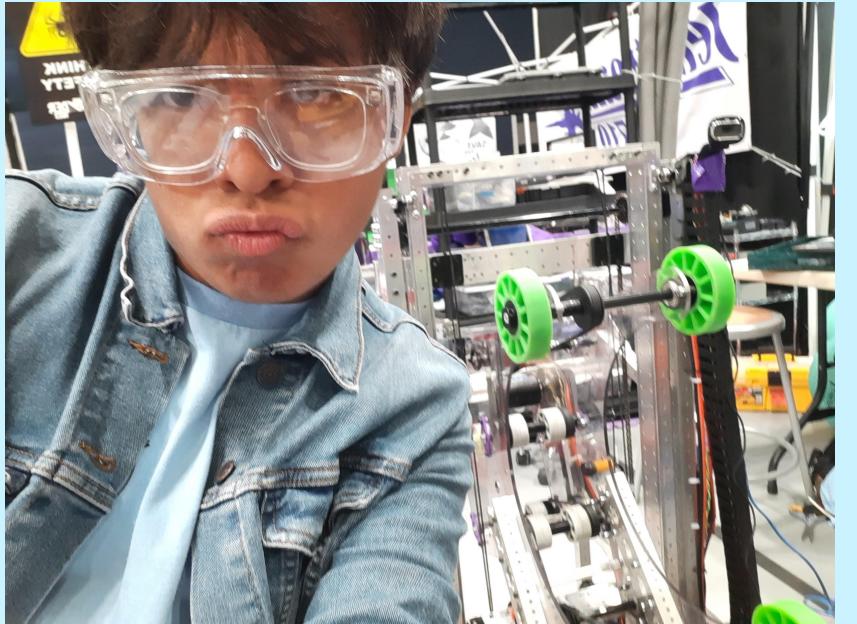
Amongst our graduating members (c/o 2025):

- 100% attendance into a four-year university (UCSD, SDSU, UCR, UCI, UCM, Embry-Riddle) for fall 2025
- 88% entry into an engineering program at their university
- 75% pursued a major related to their work in FRC (Computer Science Engineering, Electrical Engineering, Mechanical Engineering, etc.)



SAN DIEGO REGIONAL

MARCH



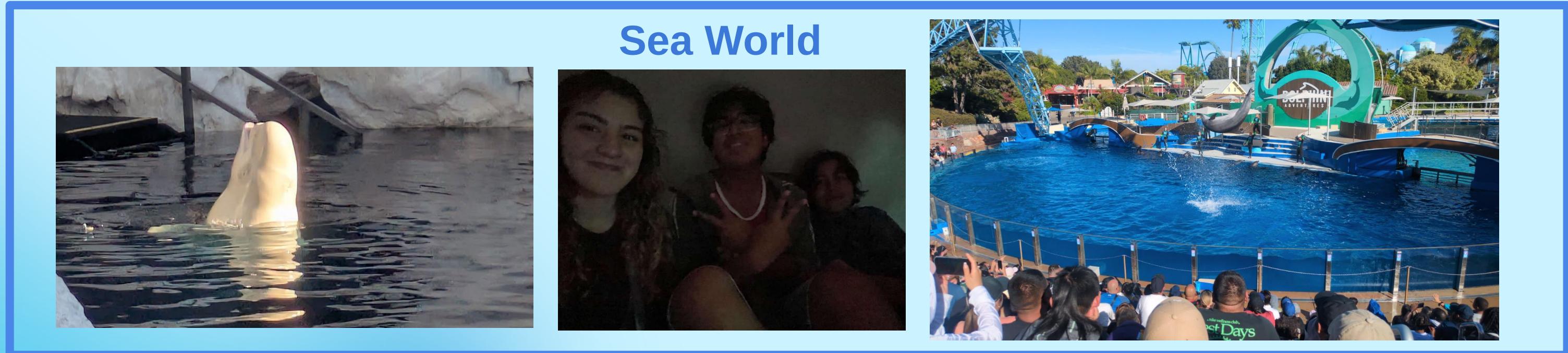
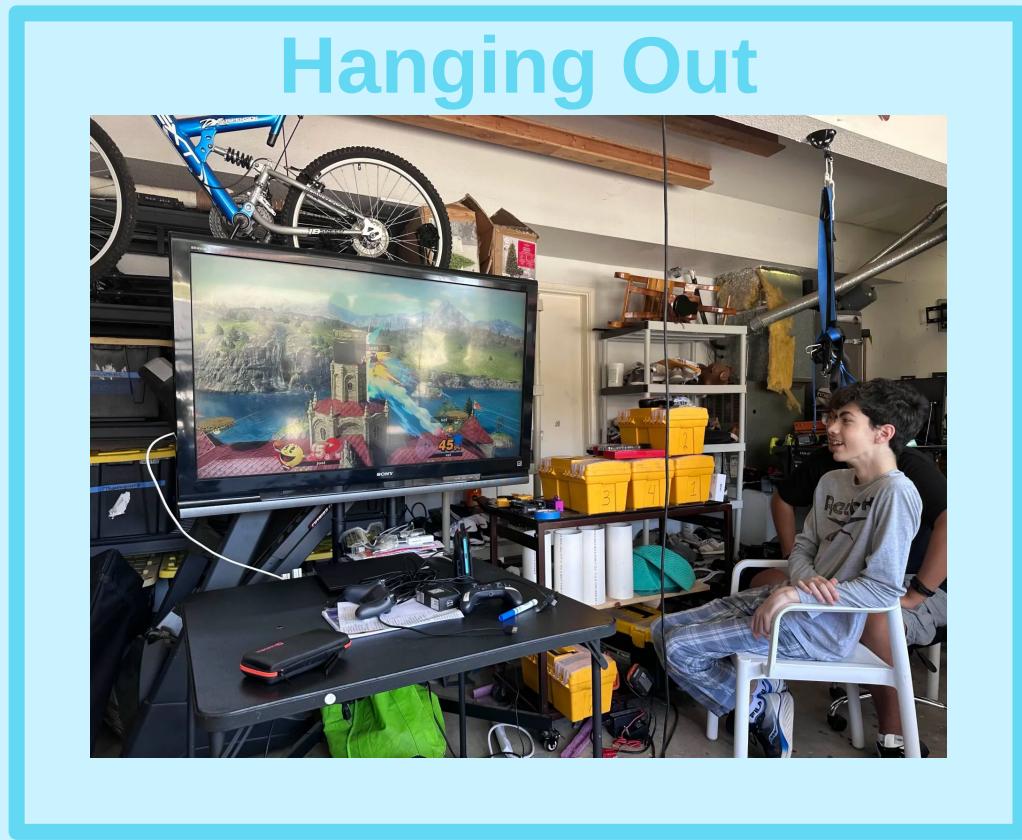
Competitions

FAIRBOTICS

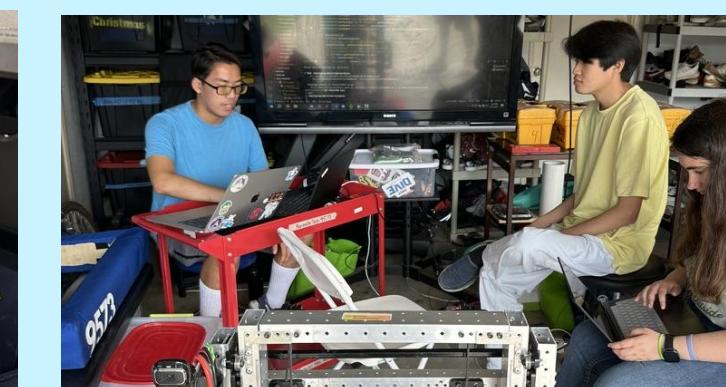
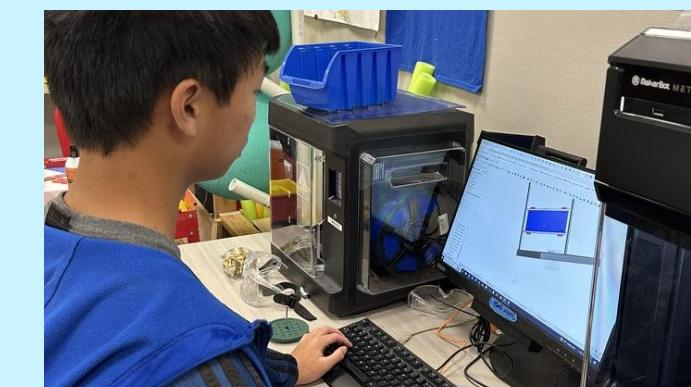
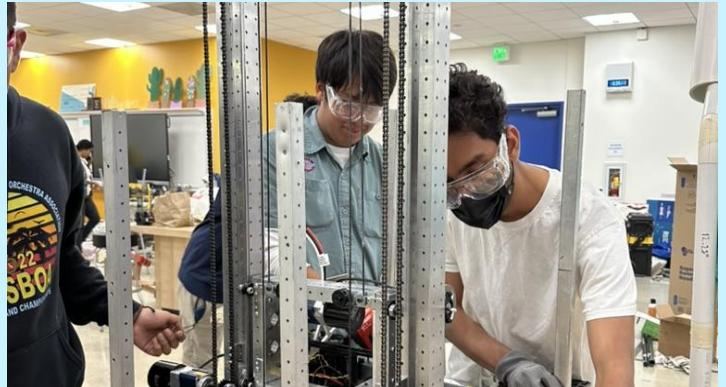
JUNE



Team Bonding



Departments



Mechanics

Involved with fabrication of components and assembly of mechanisms. Works with other departments to come up with robot designs and iterations

Head: Danny PastorVilla

Majors: Mechanical Engineering, Industrial Engineering, Manufacturing Engineering, Aerospace Engineering

Electronics

Involved with connecting motors, pistons and vision devices. Electronics designs, connects and troubleshoots electrical components.

Head: Vincent Nguyen

Majors: Electrical Engineering, Robotics Engineering, Computer Engineering

CAD

Models the robot and different systems in OnShape.

Head: Shrikant Yadavalli

Majors: Mechanical Engineering, Industrial Design, Civil Engineering, Manufacturing Engineering

Programming

Writing programs for the robot using Java, VS Code and GitHub. Makes the robot respond to inputs and sensors and automate tasks.

Head: Eva Serrano

Majors: Computer Science, Software Engineering, Computer Engineering, Data Science, Robotics Engineering, Machine Learning

Business & Media

Manages the team's finances, organization, outreach and recruitment. Maintains social media and emails to supporters

Head: Ruby Tran

Majors: Business Administration, Management, Marketing, Finance, Project Management, Entrepreneurship, Communications

Join us!



Discord Server

<https://discord.gg/btJcMFdv78>



Instagram

@frcmaraudertech9573



Website

<https://marauder.tech>

Our first team meeting will be Monday, September 8th from 2:30-5pm in the engineering room!