

Briefly describe the impact of the FIRST program on team participants with special emphasis on the current season and the preceding two to five years

FIRST has sparked a passion for STEM in the heart of all Zebracorns. In the past 5 years, all of our alumni have gone to college, and a majority have pursued STEM careers. Additionally, FIRST helps our students develop 21st century skills that transfer to the professional world. Our students lead workshops with the community, present to industry professionals, and expand their technical horizons. For all of our members, FIRST has generated a devotion to teaching and inspiring others.

Describe the impact of the FIRST program on your community with special emphasis on the current season and the preceding two to five years

Whether it is attending the annual NC Emerging Issues Forum to talk about the looming impact of automation on jobs, or simply putting a smile on the faces of children at Northgate Mall's Halloween Extravaganza, The Zebracorns reach out to the community and let the world know about how FIRST is changing it. Our new lab space at Northgate Mall, which we share with both FLL and FTC teams, is enabling us to expose countless mall visitors to not only FIRST, but also STEM as a whole.

Describe the team's innovative or creative method to spread the FIRST message

Team 900 embodies diversity. Our host school, NCSSM, brings a diverse group of students from across the state to live on campus, but our team is open to students outside NCSSM, and there are no participation fees. We regularly reach out to people and organizations in our 45 hometowns throughout NC by encouraging, enabling, and supporting our students to inspire their local communities and local FIRST teams through volunteer service as well as mentoring and technical support.

Describe examples of how your team members act as role models and inspire other FIRST team members to emulate

Our team is student run, with project managers who promote focus on priorities using the Getting Things Done method. Sub-team leaders push their teams to learn cutting edge technologies. New Zebracorns are quickly groomed by current team members to take active roles on the team. Online assignments from Canvas, team management through Trello, and communication using Slack give a professional flair to the team while enabling new students to grow into the team members The Zebracorns are known for.

Describe the team's initiatives to help start or form other FRC teams

We have focused our efforts on supporting existing FRC teams; we noticed a trend of FRC teams struggling to sustain themselves after three years. To encourage sustainability in NC, we are creating a summer accelerator program for pre-rookie FRC teams to become more acquainted with FIRST, tool skills, and the process of building robust robots. By supporting these teams, we help them achieve FIRST's mission, and will help create sustainable long-term growth for our region.

Describe the team's initiatives to help start or form other FIRST teams (including FIRST LEGO League Jr., FIRST LEGO League, & FIRST Tech Challenge)

Team 900 encourages its members to be active outside of FRC. With the encouragement of mentors, we advise our students to give back to the greater FIRST community by assisting and mentoring FLL and FTC teams. These teams that we have assisted and mentored have gone on to win numerous awards. While we have not started any FIRST teams, we pride ourselves in our involvement with FLL and FTC meetings, scrimmages, competitions, and tournaments. We offer help to any and every FIRST team seeking it.

Describe the team's initiatives on assisting other FIRST teams (including FIRST LEGO League Jr., FIRST LEGO League, & FIRST Tech Challenge) with progressing through the FIRST program

By creating a space in which FTC, FLL, and FRC teams are able to work together, we inspire younger students to progress through the FIRST programs, and encourage older students to support their younger counterparts. Our students teach technical skills to FLL and FTC students, help them develop professional skills, and show them that being innovative is something to be proud of. These younger students have become part of our FIRST family, and we cheer them on in all of their endeavors.

Describe how your team works with other FIRST teams to serve as mentors to younger or less experienced FIRST teams (including FIRST LEGO League Jr., FIRST LEGO League, & FIRST Tech Challenge)

In December, we hosted FRC workshops for 287 people, where our students and mentors presented on topics including tool safety, team culture, and computer vision. We invited teams throughout the state to learn from us as well as other teams. We also regularly publish white papers, host seminars and webinars, share our code, and answer questions from other teams throughout the world. We also share our lab space with FLL and FTC teams, and regularly volunteer at their scrimmages and competitions.

Describe your Corporate/University Sponsors

Our host school, NCSSM, is a member of the UNC school system and has provided us with tremendous support for the past 15 years. Our most recent sponsor, Nvidia, commends our work with vision processing using their visual computing products. Some of our other valued sponsors include IBM, Qualcomm, United Therapeutics, Northgate Mall, Ryerson Metals, and Zubaz. In addition to monetary donations, they have contributed materials, services, work space, and even team uniforms.

Describe the strength of your partnership with your sponsors with special emphasis on the current season and the preceding two to five years

We rely on our sponsors' support and reciprocate by participating in corporate events like Take Your Kids To Work Day and other STEM learning activities. One of our sponsors, Nvidia, invited our mentors to speak to FIRST teams at workshops they held in CA on vision processing for FRC. Aside from technology companies, we have introduced FIRST to companies like Zubaz, which makes our signature zebra pants. Our sponsors support our mission to inspire and empower students everywhere.

For FIRST Robotics Competition teams older than 5 years, briefly describe your team's broader impact from its inception

For the past fifteen years, The Zebracorns have acted as a catalyst for making NC FIRST teams more competitive. With our white papers, workshops, YAMs, and countless seminars, we have helped teams throughout our region and the world become stronger and more knowledgeable by sharing our unique recipe for success. We want to push the boundaries of what is generally accepted to be possible while simultaneously making all teams more competitive and maintaining gracious professionalism.

Describe how your team would explain what FIRST is to someone who has never heard of it

FIRST is an opportunity for students to discover their passion, whether it be engineering, business, design, or something else entirely. FIRST teams enable students to explore teamwork, leadership, and communication in an environment unlike any other. You don't need to have experience to join, as long as you're willing to learn. This opportunity to explore and collaborate motivates students to reach greater heights, grow confidence, and take hold of their futures.

Briefly describe other matters of interest to the FIRST Judges, if any

When it comes to team culture, The Zebracorns are a horse of a different color. We pride ourselves in our student leadership, project management, and communication. Student leadership allows students to weigh in on all aspects of the team. We also use industry technologies such as Trello and Slack to divide tasks and share information efficiently. We promote 21st century technical and professional skills to prepare our students for tomorrow's challenges.