Chairman's Award - Team 5437

2020 - Team 5437

Team Number
5437

Team Name, Corporate/University Sponsors

Briefly describe the impact of the FIRST program on team participants within the last five years.
Our team shapes students into leaders and capable problem solvers with a strong will to succeed by encouraging them to take hold of positions in all aspects of FIRST. Students take up vital roles on build, grant writing, and promoting teams, just to name a few. All our graduating team members have gone to college with 100% receiving scholarships in STEAM fields. In spite of their rural background, members realize and value the positive influence they exhibit on their community and world.

Describe the impact of the FIRST program on your community within the last five years.
Our Team has opened our community's eyes to the impact of FIRST through multiple outreach programs. We initiated the startup of PLTW Gateway courses in our junior high to create and grow STEAM strong students. We have collaborated with local universities to integrate up to 18 hours of concurrent credit classes in Industrial Robotics at our high school. Our members visit our elementary school for their Rise & Shine program to share the joy and sense of community FIRST has created for our members.

Describe the team's methods for spreading the FIRST message in ways that are effective, scalable, sustainable, and creative.
Our team uses multiple social media avenues to communicate our excitement for FIRST. We have met with Arkansas Governor Hutchinson to lobby for funds increasing STEAM education. Team 5437 was featured in an AEP/SWEPCO commercial promoting FIRST that was aired over a 5 state area. We have addressed the Arkansas School Board Association to educate district leaders on how we implemented FIRST. Our members presented mini workshops at STEAM events for youth held on college and high school campuses.

Describe examples of how your team members act as role models and inspire other FIRST team members to emulate
Team 5437 members pride themselves in being friendly, inclusive, and accepting to all. Our senior members emulate these core values when mentoring FLL teams, presenting at STEAM events for youth, or speaking about positive character traits to elementary students. We embrace student members from other school districts and encourage team members to work collectively to reach the team's goals. We share our facility with other teams and model true FIRST teamwork.
Describe the team's initiatives to help start or form other FRC teams:

Coming from a low income, rural area, our opportunities to start other FRC teams are limited. We took on the task to increase teams in Arkansas. We met directly with the Governor of Arkansas requesting funds to be appropriated for STEM activities within the state. As a result, funds for 18 new FRC teams are available. Arkansas teams have grown from 6 to over 25. We invite students from area schools to join our team in hopes they will become involved and influence their schools to form teams.

Describe the team's initiatives to help start or form other FIRST teams (including Jr.FLL, FLL, & FTC):

Our team has been instrumental in the start up or forming of 2 FLL teams at Booneville Elementary and a 3rd team at Magazine Elementary. Mentors and team members work closely to help with registration, build and presentations for competition. Team 5437 allows FLL teams to use their build site for all meetings and to build their robot and practice for upcoming events. Team members and mentors are available to answer questions, give constructive criticism and attend competitions for support.

Describe the team’s initiatives on assisting other FIRST teams (including Jr.FLL, FLL, FTC, & FRC) with progressing through the FIRST program:

Our team continues to provide assistance to Team 7103 Stringerbots and the FLL Pixel Snakes. Our build site and equipment is open to all teams to collaborate, build, get help with programming, etc. We have also provided assistance through emails and Skype to teams from other countries such as Chile and Israel. When at competitions we have assisted teams by giving rides to hotels for the Chilean and Germany teams and worked on alliance robots to get them ready for competition.

Describe how your team works with other FIRST teams to serve as mentors to younger or less experienced FIRST teams (includes Jr.FLL, FLL, FTC, & FRC teams):

Our team mentored Team 7568 Tro-Bots and Team 7103 Stingerbots in their first year of build and competitions. Our build site gave them a place to build as well as a full practice field. Team 7568 was 3½ hours from our build area so we housed them and provided food for weekend work and discussed through email and texting during the week. We allowed them to be a part of our chat and team notification information which gave them insight with all aspects of our project.

Describe your Corporate/University Sponsors:

Corporate sponsors were very instrumental in the start up of our team. At a Chamber of Commerce annual banquet, Rockline pledged monies and a build area in their industrial facility to start an FRC team citing that Logan County needed a team. That same night, State Representative Jon Eubanks and the Chairman of First Western Bank pledged their support in starting a team. Through the years, we have added the corporate sponsorship of ABB, AEP/SWEPCO and Gene Hass Foundation.

Describe the strength of your partnership with your sponsors within the last five years:

After 5 years, we continue to have a strong partnership with our sponsors. They follow our team throughout competitions and are always anxious to allow the team to demonstrate robot techniques or hear from our team members. SWEPCO allowed our team to be a part of a commercial focused on robotics. Sponsors believe the program and students will give back to the community and enhance their workforce with qualified individuals.

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

Team 5437 describes FIRST as a program that is on the cutting edge of today's world. It encompasses innovation, technology, business applications and allows all team members to be involved. From designing and building a robot, to constructing the new game field or scouting during competition, the opportunities are endless for members to learn and become leaders. Teams are exposed to all walks of life and culture and are able to talk with judges about the impact FIRST has had on our community.

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

Each year, prior to the Arkansas Regional, our team sends personal letters of invitation to the Governor and all Representatives and Senators at the Arkansas State Capitol. In addition, our team makes a personal visit to the capitol to follow up on the letters and remind them of competition and answer any questions they may have. During our visit in 2019, our team members were interviewed by the capitol radio station which was aired throughout the state.

For FRC teams older than 5 years, briefly describe your team's broader impact from its inception:

Team Captain/Student Representative that has double-checked this submission.

Drew Garrett
Essay

In 2015, Rocky Balboabots inaugural year, no one could have anticipated the excitement that would spread and launch our team through to 2020. Over time our team members have grown from uncertain inquirers to confident innovators. During the last five years we have had time to reflect on things that haven’t gone our way, but mostly revel in all that FIRST has taught us about ourselves and our world. We took the FIRST name and modified it into an acronym representing some of the most important values of our team. They are: Futures, Innovation, Relationships, Success, and Teamwork.

Futures:
Team 5437 has become a catalyst for the future of our town. Spreading the hope of a brighter tomorrow in a town so small dreams rarely escape the city limit sign. Most of our team members attend classes in a school where 100% of the students receive free and reduced lunches. Our town has been hit hard by the drug epidemic plaguing our nation. Many of the homes in our town are made up of grandparents, single parents, unemployed parents, family friends, or even teachers raising our youth. In May of 2019, the daycare for the southern part of our county closed its doors without notice. This closing affected more than 60 children leaving families with no facility to care for their children. Our team took the challenge and was instrumental in the reopening of the daycare by using its resources and contacts made through FIRST to expedite licensing, staffing and ultimately the reopening of the daycare. Team members volunteered to paint and clean the facility prior to reopening. The daycare reopened in August 2019 and continues to provide quality daycare for our community. In spite of all the bleak statistics, our team has persevered to now join the efforts in a revitalization of our town. Our former team members have all gone on to attend college, mostly pursuing STEAM careers. The success of our team’s members and alumni has given even the adults of our community the confidence in themselves that they too can accomplish difficult, but great things.

Innovation:
We recognize STEAM as the way of the future. Due to the success and desire our members have to stay up to date with the most current technological trends and equipment, our team was instrumental in partnering with the University of Arkansas at Fort Smith to develop a concurrent credit program in Industrial Robotics on our school campus. Students enrolled in these courses have access to 18 credit hours of college credit with an on-site instructor as well as ABB robotic arms, PLCs, and a well-stocked soldering lab. Over the course of the last five years we petitioned our administration to start PLTW Gateway classes and FLL teams. We are proud to now have access to STEAM programs extending from the elementary to collegiate level. The skills possessed by students in FIRST are well known, and they are often sought out by students to repair various electronics such as headphones and gaming consoles. Team members’ reputations for their tech savviness has also spread throughout the faculty and staff resulting in requests for repairs to items like breadboards in the bus garage, speakers in the fieldhouse, and remote controls to video equipment.

Relationships:
We take our robot everywhere we are able to share our infectious enthusiasm with anyone who will listen. We have sought out to spread our influence within the community and surrounding areas. Since the start of our team we have not only implemented two FLL teams within our small elementary school but have extended FIRST’s reach into a neighboring school district, Magazine, to start Team 37677, the Pixel Snakes. We have traveled to Dover Junior High to present a plan of action to their board, who were in the process of starting a team after our visit. Our team is currently mentoring Team 7106, the Stingerbots from Mullberry, Arkansas. We began mentoring in their rookie year of 2018 and were able to assist and prepare them for competition at the Rock City Regionals. There they won the All Star Rookie Award which allowed them to compete at the World Championship in Houston. In addition, we have hosted the Danville Schools in an effort to lead them in the forming of a FRC team. They visited our build site and toured our sponsor’s factory, all in efforts to encourage them. We aided the 2020 Rookie Team 8307 GRIZZLYs with their startup. Our team was invited to exhibit/demonstrate our robot at the Fort Smith Business Expo. At this event the team was able to make a number of contacts with area businesses, manufacturing companies and colleges. While at the Expo, the team members were able to examine a robotic mannequin from the Arkansas College of Heath Education. This robot is a simulator for the medical students to practice diagnosing ailments. When the students were able to examine the inner workings of the mannequin, they pointed out that it had some of the same components as our robot: robo rio, pneumatics, actuators. Later in the summer, the team was able to tour the Medical College and give students a demonstration of our robot.

The team has had to opportunity to promote our schools robotics classes to area superintendents at the Educational Co-op, the Arkansas Education Council at Beebe and the Arkansas School Board Association in Little Rock. In all of our presentations, we took our robot and demonstrated to those attending and also allowed them to drive and become a part of the game. We believe it is very important to educate the educators and administrators concerning FIRST with the intent to open their eyes to the impact of the program.

https://my.usfirst.org/frc/ca/site.lasso?r=0957867&fuseaction=ca.print_submission&sid=19898&pid=1024426
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FIRST is not only about pushing local boundaries, but also about extending boundaries to connect across the globe. After traveling to the Houston World Championship in 2017 our team created a partnership with Team 2096 of Dimona, Israel. We strove to bridge the gap between our countries, and to unite as one. Nitay Ledany, an Israeli government liaison came to speak to our team and community about the impact FIRST has had on their local economy. That opportunity to build a relationship between teams and other countries has given our team a different outlook on the world. We were able to see the differences in technology, engineering, and community across the globe. Through the partnership with Team 2096 from Israel we learned to collaborate and work with people, despite the differences in culture.

Success:
From the inception of our team, our state and local elected officials have been very good about supporting what we do. Representative Jon Eubanks and Senator Gary Stubblefield have not only supported us financially but have also helped us set up meetings with Arkansas Governor Asa Hutchinson and Speaker of the House Jeremy Gillam. Our goals for these meetings were to educate our elected officials about FIRST and the impact it has not only on the students, but also how it can help grow and invest in the economy of Arkansas. We were also able to impress upon them the need to fund programs like ours through the Every Student Succeeds Act. This visit was our teams’ way to push for the 1.65 billion dollars funded to Arkansas STEM education through the ESSA. We are proud to be a part of the movement that was able to push the funding through.

Teamwork:
Our team gives every individual a place to belong, despite their background, where they know they are valued for all they have to offer. You would rarely find an instance of any of our team members working alone on anything. While we do understand the importance of the technology, we also understand the value of the soft skills that are required to work in today's workplace. Skills such as, communication, adaptability, problem solving, creativity, work ethic, and time management are all skills that FIRST has equipped us with that we would not have otherwise possessed. Our team gives back to the community in multiple ways. When our daycare closed, our team gathered all the resources available including time, tools, and manpower to assist with its restart. While we all may have a different independent skill set, collectively we can accomplish anything.