

Tribe Tech #4485 NASA Chairmen's Award

Selected Event	Boilermaker Regional
Team Number	4485
Team Name	NASA / Rolls-Royce / Allison Transmission / Waterjet Cutting of Indiana / TechPoint Foundation for Youth / Indiana Department of Education / VDS Racing Engines / Duke Energy Foundation & Danville Community High School
Team Sponsors	NASA Rolls-Royce Allison Transmission Waterjet Cutting of Indiana TechPoint Foundation for Youth Indiana Department of Education VDS Racing Engines Duke Energy Foundation
Impact on Team Members	Our FIRST experience has greatly improved our knowledge of the mechanical assembly process. We are now interested in learning more about engineering careers. From designing, to manufacturing, to assembling, we have been able to get a dose of everything. We've improved our communication, problem solving, team work and leadership skills by interacting with our peers and mentors on the team.
Role Model Characteristics	We've developed and exhibited communication, problem solving, team work and leadership skills by interacting with our peers and mentors on the team. We have developed friendships with other people and teams that will last longer than the competition they were founded on. The lessons of FIRST will be with us the rest of our lives, it has been an incredible experience.
Impact on Community	FIRST has had a huge impact on our team this year. We've all grown in a number of aspects, including problem solving, leadership, and technical skills among others. As a team, we have made new friends and learned invaluable skills. FIRST Robotics has let us become better, more rounded individuals.
Innovative Methods to Spread FIRST	We have come up with a number of ways to be innovative in spreading the FIRST word. We put videos and pictures of our robot on the video announcements to spark interest in our high school. We also plan on doing different events at our middle school to encourage them to pursue science and math skills. After the competition, we are going to do a public demonstration to show our progress and gain support.
Strength of Partnership	Our team has partnerships with a couple of other schools, one including Ben Davis of Indianapolis. This partnership has enabled both teams to shared designs for their robots, like our shooter design. We have also partnered with some business supporters of FIRST who provided parts for us.
Communication Methods	Our team has made Facebook and Twitter pages to stay connected with each other and our supporters. We also use emails and the school announcements to spread updates. This has not only help spread the word to just our team but also to other students, other teams, and our community. At our school, it has spurred a new interest in technology and engineering.
Other Considerations	
Main Essay	David's Fault

You know that guy who no matter what he does it's always his fault? Well, for the Danville Robotics team, that guy is David. Not that it's a bad thing that it's his fault, we know that no one would be here without his actions.

It was almost a year ago that David began showing interest in the FIRST program. He contacted Mr. Klinker, our school counselor that he also knew through scouts, and got him excited about the possibilities that the program provided. It was at the beginning of this year that we began in earnest with a call out and several mock competitions.

We had quite a variety of people show up for our meetings; the diversity was fantastic. We even have a few foreign exchange students. And yet somehow we all manage to work together. It's difficult to determine how many times we've taken apart and put the robot back together again. We have even gone so far as to work with other teams, both through co-operation with the Ben Davis team and the other teams that work with our part provider, Waterjet Cutting of Indiana.

Spreading the FIRST Word

Being a first year team, we have truly understood the importance of spreading the FIRST word. We have had two different focuses in our spreading of the word about FIRST Robotics. Initially, we plan to open the eyes of our own high school to FIRST. We have made Facebook and Twitter pages for social media access to our team and supporters. Throughout the building process, we have taken pictures and videos of the robot driving or shooting. These videos and pictures, as well as an interview with our mentor, Mr. Klinker, were featured on the video announcements at our school. This was a huge step in spreading the word and also gaining interest for our team. When the robot has been completed, we plan on doing a demonstration for our school and the community. Hopefully, this leads to support from the town, such as a sign or an article in the newspaper. By updating our community on our progress, we really show the importance of FIRST to each and every team member.

Of course, there is more to the world than the small community of Danville, IN. Over the years, FIRST Robotics has truly become a nationwide brand. On a smaller scale, we have worked with local organizations and teams to better our robot. We have been fortunate enough to be helped by Waterjet Cutting of Indiana, a business that has been involved in FIRST for a number of years. Our awareness of companies has vastly grown because of their contributions to our team. Companies such as NASA, Allison Transmission, Duke Energy, Electric Plus, VDS and Rolls-Royce have been great supporters for our team. According to Rolls-Royce.com, "In the US we support FIRST Robotics whose vision is to create a world where science and technology are celebrated and where young people dream of becoming science and technology leaders." We appreciate their assistance and value their confidence in our ability. In return, they receive positive association with education and FIRST Robotics.

Outreach and promotion to grow the program

Our team has been given an amazing opportunity to participate in FIRST Robotics. This program has given our team the chance not only to learn about technology and engineering, but also to experience working with others as a team, meeting and learning from mentors, and learning to present ideas or concepts to others. We were given a challenge and learned new skills through the hands on experience of building a robot with others. Many of our team members did not have any experience with the technology we encountered during this season, but we were willing to put in the extra effort to learn. We hope this will show our school administration that we have students interested in mechanical classes and our school is in need of that type of curriculum.

Not only have we connected with students from different activities within our school, but we have also partnered with other schools like Ben Davis in Indianapolis. Our mentor, Mr. Klinker, is our communication link with the other Robotics team. We have exchanged ideas for different parts of the robot, including our shooter design. Currently, Ben Davis is designing another part to share with us. Both Robotics teams have been fortunate to work together.

We hope to share this opportunity by reaching out to both the middle school and the special education program of our school corporation. At the middle school, we will demonstrate how our robot works and encourage anyone interested in technology and engineering to join our FIRST Robotics club when they get to high school. Currently, we are planning a day to help and teach the special education students to build

Lego Mindstorm robots. We hope they will enjoy building a robot as much as our team has enjoyed it.

The incredible value of our FIRST experience has greatly improved our knowledge of the mechanical assembly process. We are now interested in learning more about engineering careers. From designing, to manufacturing, to assembling, we have been able to get a dose of everything. We've improved our communication, problem solving, team work and leadership skills by interacting with our peers and mentors on the team. We have developed relationships with others we would not have normally associated with. It has broadened our view of what it takes to organize a program. The lessons of FIRST will be with us the rest of our lives because it has been an incredible experience.

Certified By

Melanie Turner

Pictures

