

Girl Powered Essay VEX

When I think of “Girl Powered” I think of women being the foundation of a team. I imagine a team where women have an equal say in all parts of the process of the VEX competition. We are just as valuable assets to the team as the boys and we should be treated as such. Our team takes this approach to heart. My team this year is only a team of two. We make decisions together, we are a democracy, we don't move forward until everyone is happy with the plan. Last year when we had a bigger team, we used the same approach. I was the only girl on the team, yet I felt like I had an equal say because we made sure that everyone was on the same page during every major step of the way.

The reason this approach works is that everyone has at least some practice in all areas of VEX. My teammate Cole may be better at building and driving the robots, but he knows the basics of design and coding, so he's able to be part of the decision making process on things that may not exactly be in his wheelhouse. It's really important that newer team members learn the basics of everything in VEX. Especially since our team is small, we need people who can do multiple things well so they can help whenever the programmer is struggling with code, the engineer can't figure out how to overcome a problem in the design, or help the builder if they need help. I got the opportunity last season to try a bit of everything in the process. Robert, a member of the 2019-2020 team, had experience in code before the class and passed some of that information to me and Cole. I also got the opportunity to help build the robot. Cole and Dylan, another member of the 2019-2020 team, built and designed a decent amount of

the robot, but I helped research and design the robot and I was also a large part of the building. I got the opportunity to drive the robot as well during earlier parts of the season. I felt well versed in everything by the end of the season and it allowed me to make an excellent engineering notebook because I had experienced all the aspects of what robotics had to offer. I can speak for my other teammates who went through similar experiences of trying every part of the competition. Our approach proved to make our team well-rounded and led to better communication as it was easier to stay on the same page as one another.

We are working very hard right now to recruit future members for our robotics team, whose numbers are dwindling and we need students of all types to help keep our program going. Our team has gone to elementary and middle schools to try and promote our program at the high school. We have tried to break down this idea that only nerdy white guys do robotics. Well maybe robotics is nerdy...but everyone should get to be nerdy without being intimidated by the lack of diversity. Students do not want to be a part of a team of people who don't look like them. I have taken the lead on this outreach to try and inspire fellow girls of color to join our awesome program.

Gender and racial diversity weren't the only two things we sought to achieve during our seasons. We had to adapt our environment so that our teammate Robert, who is confined to a wheelchair with a muscular disease, could perform his best in robotics. He is a very smart guy and was pivotal in designing and coding the robot, but he wasn't able to be a part of the building and driving parts of the competition. We tried our best to accommodate his needs so he could give his full input to the team.

Diversity is essential for teams to function to their full potential. I bring experiences to the table that nobody else can because I am a woman with immigrant parents. We don't know how hard it is to live Robert's life. Only Dylan knows what it's like to be the only open LGBT member of the team. These differences in our lives are essential to making this team work. Having all these perspectives on communication, teamwork, and work habits can make it difficult to be on the same page all the time, but it creates the best possible product, our differences in approaches to life gives us unique ideas and the tools to succeed as a team. We feel that this diversity is so important that outreach is one of our main goals for this season. This may become our sole priority if there is no season this year.

My STEM role model is my friend Isabelle. We met at a tournament during last season and we started texting each other. She shared her experiences in robotics; she was a part of an all girl team but later switched to be on an independent team with her brother. She is my role model because she was my mentor in robotics, she was the only girl around my age who had experience in competitions and she helped myself and my team be successful. She gave me tips on how to build, program, and strategize as a team. She showed me past projects for online challenges and even inspired me to write this essay. She has inspired me to start the outreach we've done for our program, she and her brother have done similar events and I saw an opportunity to build our program, particularly to younger girls interested in STEM. I don't know where I'd be without her guidance.

Girl Powered means to have women play a foundational role in our robotics team. But it also means creating an environment where everyone of all backgrounds

can thrive. Being Girl Powered means to take our differences and to use them to bring our team together instead of isolating each other. Being a part of a team means being a part of a family, we look out for each other and care for each other unconditionally. I think that our team has adopted this mentality and has led to our success at several levels of competition including local and state levels.

