# Success Story

Realityworks®
Live it. Learn it.™

"I have never used a virtual welder before, but guideWELD VR is very easy to use... I actually look out for my angle now while welding for real... it has helped a lot."

*Rodian Manjarres*
*Welding Student*
*J. Harley Bonds Career Center*
*Greer, SC*

## Program Highlights

**Benefits of using guideWELD® VR:**

- Students can explore potential career paths without fear and anxiety of live welding
- Students gain a better understanding of correct welding form and technique
- Instructors are more able to provide individualized instruction
- Decreased cost of consumables as students produce quality welds faster

# Welding Students Excel with Innovative Welding Simulator

With a school motto of "Bridging academics and technology," it's no surprise that instructors at the J. Harley Bonds Career Center in Greer, SC enjoy using advanced technology to teach students the skills they need to pursue an associate degree, a four-year degree or a career following graduation. By combining academics and advanced technology, this technical school enables students to pursue career interests like animation, culinary arts, machine tooling and welding while they earn high school credit.
One piece of technology that has been particularly successful at the career center is the guideWELD® VR welding simulator by Realityworks. Since December 2014, center instructors have been using this tool to teach welding students basic techniques while emphasizing safety and saving money on the consumables that are needed for live welding.

**Success during first use**
Rodian Manjarres is a second-year student with a lot of experience using guideWELD® VR. Her first experience with the welding simulator occurred after her welding instructors, Todd Varholy and Eddie Squires, encouraged her to use it to prepare for her Action Skills competition at that year's SkillsUSA National Skills & Leadership Conference. Because the welding simulator provides users with real-time feedback on basic welding form and positioning in a virtual environment, both instructors felt that it would allow competition judges to understand Rodian's welding skills more easily than if Rodian just explained how she welded.

This comprehension is similar to what many users experience when they first use the simulator, which enables users to practice welding in a safe, virtual environment, without the need for consumables like metal and gas. Because it uses a virtual environment, those who are unfamiliar with welding are able to lessen their fears and better focus on skill development.

Manjarres' first time using guideWELD® VR went well – so well, in fact, that she scored a 94 percent on simulator's weld assessment, which tracks users' virtual welds and assesses them on travel angle,


**Rodian Manjarres at the National SkillsUSA competition with her welding instructor Eddie Squires.**

work angle, distance to work surface, speed and straightness.

Manjarres trained with the welding simulator during class and her free time, enhancing her technique and building correct muscle memory the more she used the tool. She would even come in early to class to work on building her skills. She became so proficient that she was soon able to do tasks that instructors usually complete, including set up user accounts.

"I have never used a virtual welder before, but guideWELD VR is very easy to use," said Manjarres. "I like it a lot because I can beat the guys at it. There are only a few of us that can get the gun to turn gold."

Getting a "golden gun" shows that the user is doing everything correctly; their work angle, travel angle, speed, distance to work surface and straightness are all in the perfect range. When this occurs, the welding gun in the simulation glows gold in color.

"We had competitions with the guideWELD VR unit," said Manjarres. "Everyone was trying to beat each other's scores and kept taking more turns. Everyone was really excited about it."

Such competitions encourage users to continue enhancing their form and technique; it enables them to build muscle memory and acts as a training aid for students to reference as they enter the shop to perform real welding. The more they use this training tool, the more developed their welding technique becomes.

"I actually look out for my angle now while welding for real," said Manjarres. "I always have it in the back of my head from using the simulator. It has helped a lot."

By enabling educators at the J. Harley Bonds Career Center to engage students while safely teaching basic welding skills and techniques, the guideWELD® VR system's advanced technology has proven to be a successful way to teach the center's welding students a valuable career skill. In fact, such engagement with an educational tool that can provide valuable feedback and help users develop skills for a future careers may just be the ultimate "golden gun" for welding education and career training among welding instructors.

*"Most of the guys are chill with me being a welder. The only problem is when a girl is better at welding than they are, but I am ok with that."*

***Rodian Manjarres***
***Welding Student***
***J. Harley Bonds Career Center***
***Greer, SC***

**Rodian Manjarres using guideWELD® VR welding simulator to refine her welding technique.**