Nanette Samanich on the job measuring fillet welds on roof panels of a treated water tank at a 1100-MW APEX generating station being constructed near Las Vegas.

BEHIND THE MASK: Nanette Samanich

This welder/CWI says opportunities abound for women in welding

BY MARY RUTH JOHNSEN

MARY RUTH JOHNSEN
(mjohnsen@ aws.org) is Features Editor of the Welding Journal.

Nanette Samanich's first foray into welding might have gotten her evicted if her landlord had known what was going on in the kitchen of her studio apartment.

"We had this shopping cart and a little Miller machine," she explained. "We put it on the shopping cart with a piece of plywood, rolled the tank in, hooked it up, hot wired it to where the stove was, and sat there and TIG welded on the kitchen counter."

Nanette's unusual introduction to welding came in 1994 from her then-boyfriend, now-husband, Richard. She had moved to Las Vegas, Nevada, from the East Coast a year or two earlier and was employed as a bookkeeper. "I'd done bookkeeping for 20 years and decided it was boring and it was time for a change," she explained. Richard, whom everyone calls Sam, was nearing his retirement from the U.S. Air Force and was trying to decide what he wanted to do in civilian life.

Since Sam had been a welder in the Air Force, Nanette suggested they start a welding business. When Sam said he couldn't do all the welding himself, Nanette told him "Show me, I'll learn." That's when they set up the welding machine in her kitchen. Sam's aim was to find out if Nanette had a feel for welding and if she liked it well enough to pursue it as a career.

With Sam serving as mentor and partner, Nanette has come a long way since those first two weeks practicing in her kitchen. The couple has established a business in Las Vegas and have both become AWS Certified Welding Inspectors (CWIs) and officers of the AWS Nevada Section. In addition, Nanette works with students at two area schools

Getting Started

First, however, she had to receive her own education in welding. "Sam said if I was really interested in learning how to do it, I should go to school and get some education and some basics," Nanette explained. "So that's what I did."

Nanette enrolled at the Community College of Southern Nevada in Las Vegas. "I started out with a theory class so I could learn the correct terminology," she recalled. She followed that up with classes in shielded metal arc, gas metal arc, oxyacetylene, and gas tungsten arc welding (GTAW). "I was really good at [GTAW] because I sew. I was used to using my hands and my feet to sew and that was my original goal, to [GTA] weld," Nanette recalled. "You have to be very well coordinated to do that." To further improve her gas tungsten arc welding skills, she took a GTAW class at the Hobart Institute of Welding Technology.

While Nanette was still in school, she and Sam opened their business, A-1 Precision Welding. Since much of the welding work in the Las Vegas area is either structural steel or pipe welding, they concentrated on welding aluminum, stainless steel, chromium-molybdenum steel, titanium, and other, more specialized, metals. "What we were looking to do was something new that we didn't find a lot of shops in town did," she explained.

Many of their jobs now are mobile service repair work, often for the hotels and casinos Las Vegas is known for. They've repaired an aluminum swimming pool, modified a stainless steel bridge for the Mandalay Bay Hotel, and completed repairs on titanium and magnesium parts for a Sikorsky sky crane, among other work. "We also do a lot of small production parts for the slot machines," Nanette said. "Those are a lot of stainless steel and aluminum parts."

In working with a wide variety of metals, Nanette said, "you get to learn a lot more about welding and how the different metals and filler metals work together. It's a very interesting field. Every day there's something new."

Spreading the News about Welding Careers for Women

Nanette is currently serving as chair of the AWS Nevada Section, as well as chair of its Education and Certification Committees. Through her Section activities, Nanette has become involved with the Southern Nevada Vocational High School and the Area Technical Training Center. She participates in the schools' training days by reading résumés and conducting mock interviews and brings new welding products to the schools for demonstrations. "I also act as a liaison between the high schools and the community" to let them know what jobs, educational programs, and scholarships are available to students.

During 2000–2001, Nanette attended the AWS Leadership Symposium in Miami. She also served as Deputy District Director for District 21. "The girls in the (high school) weld shop thought it was a big deal that a woman could get so far in this organization, especially at the district level," she said. "They only see at a local level, they don't see anything more than that." She's quick to point out to them that AWS's president from 1998–99 was Shirley Bollinger.

Nanette tries to impress upon the students, especially female students, the many career opportunities welding offers in areas such as research and development, metallurgy, sales, inspection, and engineering. "You don't have to weld," Nanette said. "There are other fields in welding that you can go to. But I always let them know the first basic necessity should be to learn how to weld because that way you'll know what a weld should look like. You'll know how the metal should be cleaned, how the bevel should match. To me, it's a basic need to learn how to weld first, then, if you're not really happy with that, pursue another career."

Nanette's advice to women who are interested in advancing in the welding industry is "there's always room for progression. You just have to want it bad enough."

Moving Forward

Nanette has followed her own advice. In May 2000, she became a CWI and these days does more inspection work than welding. While Sam preceded her in becoming a CWI, he continues to concentrate on the welding side of their business.

Recent jobs she has worked on have included weld and structural steel inspections for a $123 million expansion for the Las Vegas Convention Center and a $20 million central power plant cooling tower project. With a new monorail system going up in Las Vegas, expansions to many of the casinos, and three new power plants being constructed in the area, Nanette sees plenty of opportunities for inspection work. To help her take advantage of those opportunities, she is studying for the International Conference of Building Officials' certification test. She is also considering entering the ultrasonic testing field.

The Pitfalls and Benefits of Being a Woman in Welding

The biggest disadvantage in being a woman in this field, especially as an inspector mostly inspecting welds done by men, is the necessity of having to prove yourself over and over again, Nanette said. "They'll say, 'you don't know anything about welding.'" She carries her welding helmet and leathers with her at all times and whenever her credentials are challenged, she puts them on and demonstrates her welding skills.

The advantage is that male welders are much more willing to teach her than they are another man. "Welders are willing to show me and teach me things that I don't know," she said. "Even if I'm out there as a CWI, I'll get my hood and put it on and watch them. Some of them have great techniques that I don't know about."

While men still greatly outnumber women, the welding industry isn't nearly as lonely a place for women as it once was. "I think what's important is that the roles of women have really changed in the past 20 years and there are now more women in nontraditional roles or fields than there used to be," she said. "And the other thing that we have to remember is that we can't hold women back." Nanette said she often reminds the students she works with that "women once ran this country's [manufacturing industry] back in World War II when all our men went to war." While most of those women returned to traditional roles following the war, they had proved women could handle manufacturing jobs such as welding. "It's time to let women do things that men have been doing over the past 40 years," she said. "If they can do it, let them do it, and let's pat them on the back for going out there and doing something that women normally don't do."◆