The Railroader and the Bridge

When he was a frustrated civil engineering student, the steel bridge contest turned Don Sepulveda's life around.

DON SEPULVEDA STEPPED INTO a new role in March when he became the Executive Officer – Regional Rail with Metro, the Los Angeles County Metropolitan Transportation Authority. He says the short explanation is that he is a "railroader," which in this case means his team is responsible for Metro's interest in everything in Los Angeles County that moves on steel wheels but is not operated by Metro. As such, he deals with federal, state and local governments as well as the railroads themselves, covering everything from rights of way to traffic and noise. And much of his ability to take on this wide ranging role he traces back to his participation in the steel bridge contest. In fact, he says, "Steel bridge saved my life."

It all started in 1987 when Sepulveda decided to go back to college. "I was a non-traditional student," he said, but that just begins to set the stage. He had been out of high school for nine years, working as a contractor, a structural inspector, and other similar things.

"I had a lot of math in high school," Sepulveda recalled, "but when you don't use it for nine years, it goes away." So many of his early classes were simply getting him back up to speed. "I don't have a clue how many units I have, but there are a whole lot of math classes in there." But the story gets more interesting.

"I was married with one child when I went back to school," Sepulveda said, "and somewhere in the process we had another child. So I was a full-time student and the breadwinner for the household. I had a mortgage and a family. My wife didn't work—she stayed with the kids—and I was running a business for somebody."

Wanting to proceed as quickly as possible, he set himself a grueling schedule at California State University, Northridge. "I would go to the office in the morning and get the teams out, then go to class by eight o'clock" Sepulveda said. "After a couple hours there, I'd go do my appointments during the day. I'd go back into the office, do billing and invoicing and some





of the team work, then go back to school for a seven o'clock class that ended at 10. That was my day to day existence."

By 1993, Sepulveda was burning out. "I didn't have any motivation—there was no reason for me to be in school. I didn't see what civil engineers did. I had never even heard of ASCE or AISC. So I was about done."

That spring Sepulveda decided to take a day off from work so he could go on a field trip to see a dam with the civil engineering senior design class. "So we're on the bus and all these guys are talking about a 'steel bridge' and a 'concrete canoe.' I was interested and started asking questions, and after the field trip I went back to the ASCE room."

Looking over the bridge, he immediately had several ideas on improving and optimizing the design. It was just a month before the regional student steel bridge competition, and suddenly Sepulveda was involved. "I stayed there all night with them working on the bridge," he said, "and all of a sudden there was a reason for staying in school. It showed me there was a light at the end of the tunnel that was not a train. It was invaluable."

Sepulveda participated in two more steel bridge teams before finally getting his degree. Since then he says has done everything he can to help students, which among other things includes serving as an advisor to the Cal State Northridge student chapter. He also served as the steel bridge competition regional head judge for several years, and in the late 1990s as a national judge. He has been on the rules committee since 2001.

"When students come up to us and say, 'These rules are great,' or 'This was a challenge for us—we've learned so much,' that's what it's all about," Sepulveda said. "Let's face it, some of the stuff in the steel bridge competition few of them will ever use in real life. But they're getting experience in project management, leadership, and communication. And they're getting the idea of looking at the whole picture, not just one little aspect of it, and that's the value they take away from this."

"I can't say enough good about it. I figure that it basically saved me, and I know it's helping other students, too."

To learn more about the student steel bridge competition, go to www.aisc.org/steelbridge.

- ▼ Far left: Rules Committee members Frank Hatfield (left) and Don Sepulveda discussing one of the student bridges at the 2010 national competition in the Purdue University armory.
- ◀ Left: Don Sepulveda at the 2011 National Student Steel Bridge Competition held at Texas A&M University in May.