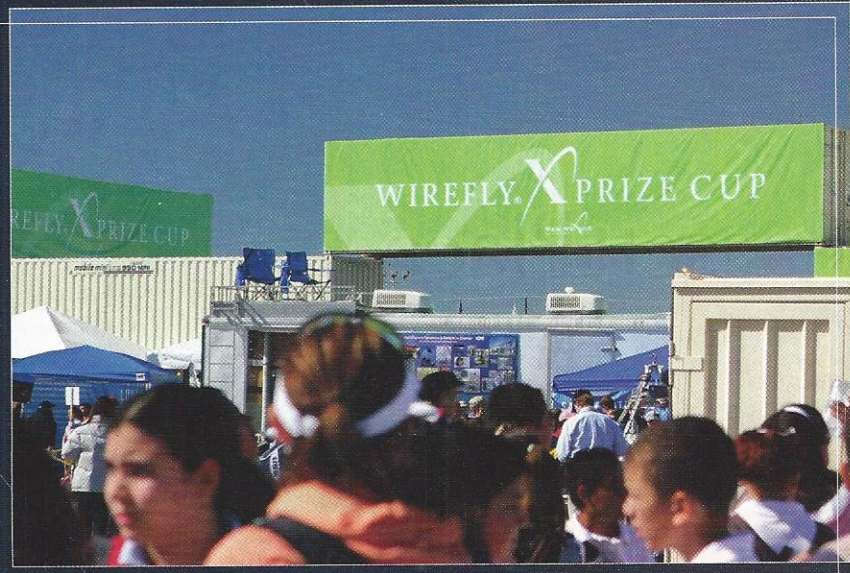
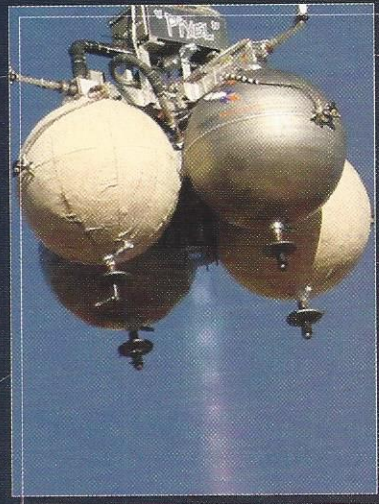


# reaching for the stars and beyond

## X PRIZE CUP by Cheri Pearson





**Imagine a classroom** with the drone of lecture fading in the background as children daydream out the window. Then, amid the sea of boredom and fantasy, inspiration arrives via a box of rocket-building kits laid upon the teacher's desk. Students excitedly gather around and work together to assemble their very own rocket. They then pile on to a yellow school bus that takes them to the world's foremost space exposition and launch their model rocket creation. Alongside their model, a large-scale, high-powered rocket launches simultaneously into space with a tremendous roar of engine power. Suddenly, classroom instruction meets real-world application. Their eyes light with a spark of imagination that has introduced them to scientific possibility and the pursuit of the unknown.

Later, these very same students are able to watch an icon walk out of their textbooks and into their reality as Buzz Aldrin stands before them in a huge astronaut tent. He looks over their upturned faces and speaks to them about the exhilarating feeling of floating around in space and of its awe-inspiring beauty. "I am just an ordinary guy who went through the education to qualify. Education opened up so many doors for me," he says. The students gaze at each other in wonderment. The untouchable, unreachable astronaut who was involved in the beginnings of space exploration in the 1960s is standing but a few feet away, telling them he is "an ordinary guy" and that any of them could become one of "the next galaxy explorers." It makes them think. Maybe their dreams are not so far reaching; maybe those dreams are right within their grasp, close enough to believe it and feel it, like a warm handshake from a man who walked on the moon.

Think this is futuristic, impossible and unavailable to El Paso? You might be surprised to know that this happened last year on Oct. 20 and 21 at the X PRIZE Cup in Las Cruces, N.M., and will occur annually from this point forward. Thousands of people from around the world attended the two-day space symposium. In addition, more than

6,000 students registered for Education Day at the X PRIZE Cup and were provided an interactive environment dedicated to educating and motivating the next generation to get involved in the space industry.

"Space was distant, something only NASA did. Our mission was to lead children to believe they can go. People are not tourists but pioneers. Here is a show-and-tell with fireworks attached," says Chairman and CEO of the X PRIZE Foundation Dr. Peter Diamandis, whose mission to bring this to fruition involved extreme tenacity, passion and vision.

The idea for the X PRIZE Cup followed on the heels of the radical breakthrough of Burt Rutan and his SpaceShipOne winning the \$10 million Ansari X PRIZE in 2004. The prize challenged private industry and the individual entrepreneur to produce a reusable, suborbital vehicle capable of carrying people to the edge of space. This concept was the brainchild of Diamandis, following in the footsteps of similar incentives like the Orteig Prize that Charles Lindbergh won in 1927 for his non-stop flight between Paris and New York. After Rutan won the Ansari prize, Diamandis wanted to keep interest and innovation alive as well as provide a venue to reach young creative minds.

"We realized private space industry was going to be huge, so every single year we wanted to provide the world's premier space show. We wanted to open up the space frontier to citizens," says Ian Murphy, X PRIZE director of communications.

And open it up they did. On that crisp October morning, floodlights illuminated an area in the middle of the desert until the sun rose and graced it with natural light. Gigantic screens portrayed all the interviews and events of the day. New technology and ideas abounded. Robots carried on conversations with humans while impressive displays stimulated the eyes. Adults and children alike were invited to meet some of today's engineers, astronauts and forward-thinkers.

The crowd was mesmerized as "Rocketman," Dan Schlund, shot up

into the sky with his raucous display of jet pack propulsion. He explained to his awestruck public that it was primarily for show, a rough ride, extremely expensive and difficult to learn. He was also not afraid to admit that, right before every show, fear grips him. "More people walked on the moon than flew this," he said with a laugh. Like something out of a movie with goggles perched high on his head, he signed autographs and let children know that it was still a lot of fun. "All the smoke, the fire, it was just too cool. So my experience left me wanting more," Canutillo student Jaime Reyes gushed.

Back in the astronaut tent, Michael Foale addressed his rapt audience of middle school children as a huge screen portrayed his experiences on the International Space Station during a 1992 science mission to study global warming. Students were roaring with laughter as the video showed him catching candy out of the air with comedic flair and experimenting with magnets and water. "When I was 6 years old, I went to a state fair in Minneapolis and decided I'd like to go to space. Twenty-four years later, I was selected after trying three times," he said. A young girl asked how he felt up in space the first time. "I cried a little bit. I was very excited. I thought of peace. It felt good to have had a goal and then achieve it."

Girls were decidedly impressed when Anousheh Ansari, the first female space tourist, spoke of being a young girl in Iran and achieving her dream to go to space. "The experience was amazing, even better than I imagined," she said. "My singular message to young people is that Earth is a precious gift we have, a unique place we are living on."

The impression was indelible. After this experience, America Anguiano, a Canutillo student, wrote, "Since I went to the X PRIZE, I appreciate science much more than before. You never know, maybe in the future I may be the world's most famous astronaut."

And it was not just astronauts imparting their advice. Gov. Bill Richardson of New Mexico arrived on a private jet to bring his own message. "The space age has come to New Mexico," he said with outstretched arms. "I have one message: think big. One lesson in discovery: be bold." Then, turning his focus to the thousands of children, he yelled, "Are you ready to go into space?" "Yes!" came the resounding response. "Then do better in science and math," Gov. Richardson said.

"Stay in school. Become America's future in scientists."

That day, science became more than an abstract study. Now, it was something attainable, something exciting. Denise Clevenger, curriculum alignment lead for the Canutillo Independent School District, worked tirelessly to get more than 1,600 students to the event. "It's been an incredibly positive experience for the kids, opened up all avenues for them and made the future real. We gave them the key, and it is no longer a secret room. The connections keep coming," she said.

Letters of appreciation with beautiful hand-drawn images of rockets and space have poured into her office. Students loved looking at the solar flares through the telescope, listening to the astronauts and watching the rockets ascend. Over and over again, the letters state that the experience was phenomenal, that it opened their eyes to science and that it awakened an interest to pursue space further.

Perhaps one of the most important aspects of the X PRIZE was its willingness to show failure at a competitive level as a positive thing. It was not about making the grade; it was about learning from mistakes, improving and trying again. Neither the Lunar Lander nor Vertical Lander Challenges hosted by the X PRIZE Cup produced winners; however, the teams will be back and better than ever. After all, as Thomas Edison famously declared, "I have not failed. I've just found 10,000 ways that won't work." Brenda Ruiz, of Canutillo, grasped that immediately, writing, "One of my all-time favorites was the rocket bike. Even though it didn't go as they wanted it to go, it was fun to watch them try. The X PRIZE Cup changed my way of thinking. It made me open up my mind and eyes to science."

Every year, the X PRIZE Cup promises to deliver a more evolved, exciting program. It will host challenges that will allow independent geniuses, right down to the visionary garage tinkerer, to participate with a viable solution. The public will continue to get up close and personal with the burgeoning market of space exploration, and children will learn the fascinating side of science and the value of failing and trying again. If even a handful of youth emerge with aspirations outside the box and beyond the books, then the X PRIZE Cup will have inspired a new generation of thinkers to reach for the stars and beyond. **ep**

