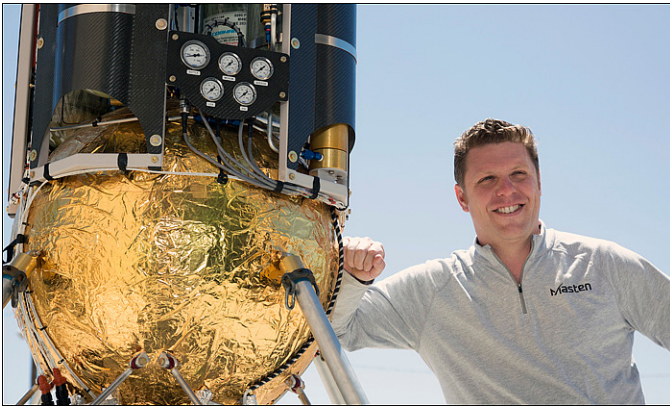


WINNER PROFILE



➔ **Meet: Sean Mahoney**
CEO, Masten Space Systems
Atlanta, Georgia | Mojave, California

➔ **The Challenge: NASA Lunar Lander Challenge**

In an effort to accelerate innovation in space exploration, NASA partnered with Northrop Grumman to launch the Lunar Lander Challenge, calling on engineers and scientists to build and fly a rocket-powered vehicle that simulates the flight of a vehicle on the Moon.

➔ **The Prize:**
 \$1 million; also awarded \$150,000 for Level One Flight

💡 **The Solution:**
 Masten flew a new vehicle called Xoie to qualify for the competition's Level Two \$1 million prize. Xoie's motor produced more than 1,000 pounds of thrust, and the vehicle landed on average within 7.5 inches of its target.

☎ **For More About the Winner:**

Kellie Gerardi
 Phone: 561-254-0300
 Email: kgerardi@masten.aero

SUCCESS: IN HIS OWN WORDS

How has participating in this challenge helped you advance your solution?

In the past year, Masten has flown two new rockets, helped the Jet Propulsion Laboratory develop technology for Mars, designed a reusable booster for the Defense Advanced Research Projects Agency, logged our 215th flight operation on a single rocket, and doubled in size. All of those accomplishments, and even one of those actual rockets, trace back to an event in 2009 — the NASA Lunar Lander Challenge. The prize gave us time to convert the focus, team, credibility and investment we earned into a business. The process of converting from winning team into a sustainable business is not an easy transition, but the winning purse enabled us to make significant progress down that path.

What is the impact of your solution for government, your community, and society?

We demonstrated that cost-effective vertical landing rocket architectures are achievable and should be a valid option. We didn't invent vertical landing, but we helped bring it closer. We also joined the ranks of other innovative teams that demonstrated that a small team with access to current-day tools and materials can accomplish things that took nations to accomplish in decades past. In a much broader sense, we think our concept and our participation helped foster renewed discussion about a return to the Moon. As we continue to work and develop our plans for lunar service, we remember and appreciate the challenge that helped get us on our way to the Moon.

