Lockheed Martin-Built Phoenix Spacecraft Lifts Off For Nine Month Voyage To Mars

NASA Spacecraft to Explore Martian Arctic's Icy Subsurface

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NASA's Phoenix Mars Lander, designed and built by Lockheed Martin, was successfully launched this morning from Cape Canaveral Air Force Station at 5:26 a.m. EDT aboard a Delta II rocket provided by United Launch Alliance.

Initial contact with the spacecraft, called acquisition of signal, was obtained at 7:02 a.m. EDT by Lockheed Martin's Flight Operations team at its Space Systems Company facility near Denver. Mars is 121 million miles away from Earth today, but Phoenix will travel 422 million miles over its 9 1/2- month journey.

"Our team is extremely proud to deliver mission success for such long- standing customers as NASA and the Jet Propulsion Laboratory," said Jim Crocker, vice president of Sensing and Exploration Systems at Lockheed Martin Space Systems Company. "We have a distinguished history of delivering Mars missions for NASA and we look forward to seeing the great science Phoenix will discover. The Lockheed Martin, JPL and University of Arizona teams have worked closely together over the last few years to make this mission a success and this morning's launch is a majestic start to the voyage."

Phoenix is the first mission of NASA's Mars Scout Program. Scheduled to arrive at Mars on May 25, 2008, the spacecraft will land on the icy northern latitudes of Mars. During its 90-day primary mission, Phoenix will dig trenches with its robotic arm into the frozen layers of water below the surface. The spacecraft will use various on-board instruments to analyze the contents of the ice and soil - checking for the presence of organic compounds and other conditions favorable for life.

"The entire series of launch-day events went like clockwork. Launch and initial acquisition is the first of our critical events, and it couldn't have gone smother," said Ed Sedivy, spacecraft program manager at Lockheed Martin Space Systems Company. "I'm thrilled to be on our way. I couldn't be more proud of the team of women and men whose hard work and tremendous dedication are helping make NASA's expanded knowledge of our solar system a reality."

During the next few weeks, engineers from Lockheed Martin, JPL and NASA will perform checkout and calibrations on the spacecraft, and make the first of several trajectory control maneuvers to maintain a course to Mars. Throughout Phoenix's cruise to the red planet, the team will perform round the clock monitoring of the spacecraft, and will maintain command and control of the spacecraft during its entire mission. The team will also work hand-in-hand with the Science Operation Center based at the University of Arizona's Lunar and Planetary Laboratory.

"Landing on Mars is the most challenging critical event we execute in planetary exploration," said Tim Gasparrini, deputy program manager for Phoenix entry, decent and landing at Lockheed Martin Space Systems Company. "Now that we are safely on the way to Mars, our entry, decent and landing team will draw upon our decades of experience in exploring the universe and focus its energy on a successful landing and surface science operations."

The Phoenix mission is led by Principal Investigator Peter Smith of the University of Arizona, Tucson, with project management at NASA's Jet Propulsion Laboratory, Pasadena, and development partnership, and flight operations at Lockheed Martin Space Systems, Denver. International contributions are provided by the Canadian Space Agency, the University of Neuchatel (Switzerland), the University of Copenhagen (Denmark), the Max Planck Institute (Germany) and the Finnish Meteorological Institute.

Lockheed Martin Space Systems Company, a major operating unit of Lockheed Martin Corporation, designs, develops, tests, manufactures and operates a full spectrum of advanced-technology systems for national security, civil and commercial customers. Chief products include human space flight systems; a full range of remote sensing, navigation, meteorological and communications satellites and instruments; space observatories and interplanetary spacecraft; laser radar; fleet ballistic missiles; and missile defense systems.

Headquartered in Bethesda, Md., Lockheed Martin employs about 140,000 people worldwide and is principally engaged in the research, design, development, manufacture, integration and sustainment of advanced technology systems, products and services. The corporation reported 2006 sales of \$39.6 billion.

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For additional information, visit:

http://www.lockheedmartin.com/phoenix

http://phoenix.lpl.arizona.edu/ http://www.nasa.gov/phoenix

EDITORS: High-resolution JPEG images of the Phoenix spacecraft being

built and tested at Lockheed Martin are available at: http://www.lockheedmartin.com/phoenixphotos.

SOURCE: Lockheed Martin

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