

## Atlantis crew inspects 'thermal protection system'

July 9 2011

The Atlantis crew on Saturday inspected the craft's thermal protection system, the outer barrier that protects it from the searing heat upon reentry into the earth's atmosphere, NASA said.

The shuttle crew "has begun its inspection of shuttle Atlantis' thermal protection system in preparation for Sunday's docking at the orbiting International Space Station, NASA said in a statement.

Crew members are using the shuttles <u>robotic arm</u> "and 50-foot (15-meter) long orbiter boom <u>sensor system</u> to get a close up look at the shuttles wing leading edges and nose cap."

Cameras on the end of the boom will take close-up pictures of the thermal protection system, made in part of a composite material known as reinforced carbon carbon (RCC).

"Imagery experts on the ground will comb through the data to make sure that the heat shield remains in good shape," according to the statement.

A camera inspection of Atlantis' heat tiles "will be conducted during its approach to the <u>International Space station</u> on Sunday. Results will be reported in an upcoming Mission Management Team meeting."

The inspections "are standard operations to ascertain if there was any ascent damage to the vehicles heat shield tiles," NASA said.



In February 2003 the <u>space shuttle Columbia</u> was destroyed upon reentry into the Earth's atmosphere, and a panel of experts concluded that a heat shield tile on the craft's wing was damaged at blast-off, fatally compromising the craft's re-entry protection.

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