

Results from the Huygens Surface Science Package

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The Surface Science Package (SSP) is one of the 6 scienti_c instruments carried by ESAs Huygens probe1. It is the only one of the six instruments whose prime aim was to make measurements after landing, but it was also operating throughout the atmospheric descent. SSP contains 9 separate sensors designed to characterize the physical properties of the surface at the probe landing site, whether it be solid or liquid. Measurements made included impact signature, temperatures and thermal conductivity both during the descent and for several hours on the surface. During descent, measurements included speed of sound, temperature, thermal conductivity and probe motion. Results from the Huygens descent to Titan on January 14th 2005 are presented, both from the perspective of instrument performance and scientific results.

References

[1] Zarnecki J. C., Leese M. R., Garry J. R. C., Ghafoor N., Hathi B., 2002, Space Science Review, 104, 593 (2002).