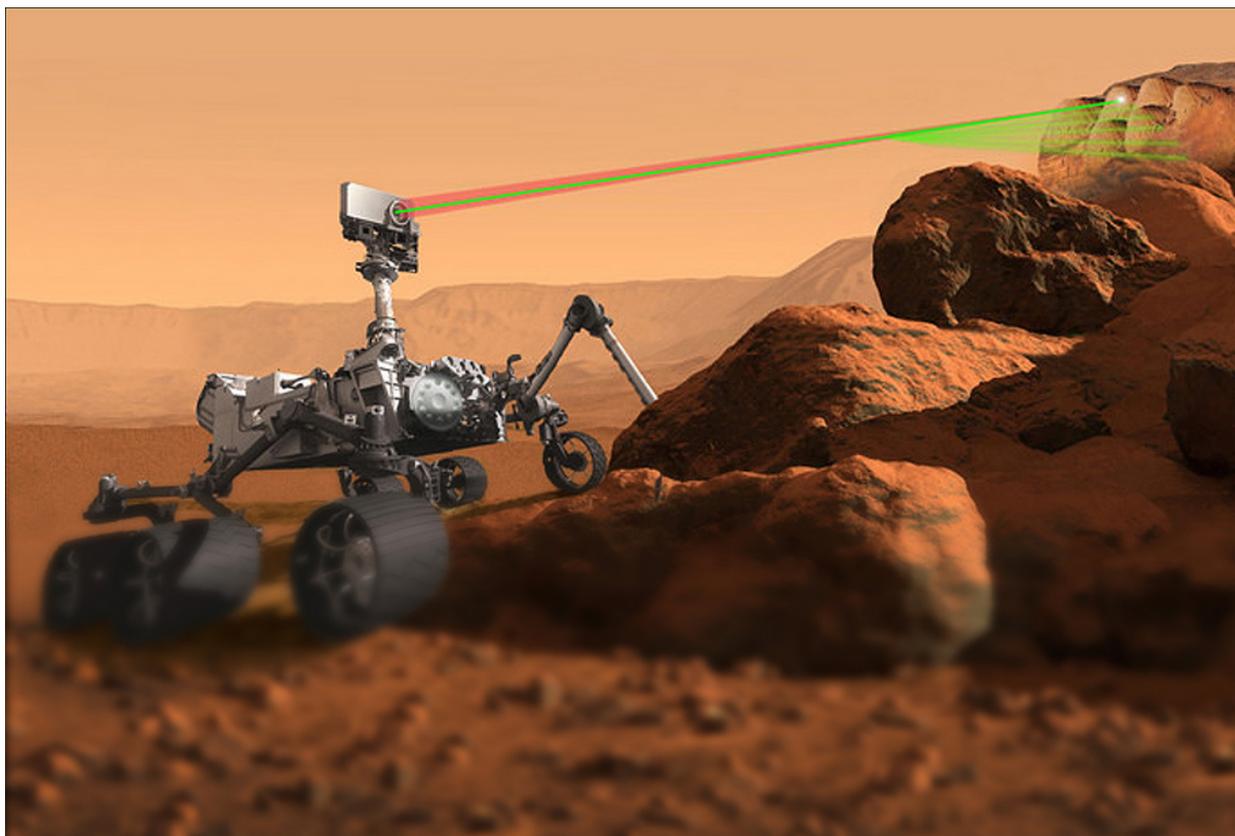

Los Alamos laser selected for 2020 Mars mission

December 22, 2014



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Laser technology originally developed at Los Alamos National Laboratory has been selected for NASA's new Mars mission in 2020.

The SuperCam instrument will allow researchers to sample rocks and other targets from a distance using a laser. In addition to harnessing Los-Alamos developed Laser-Induced Breakdown Spectroscopy (LIBS) technology—which can determine the elemental composition of the target from more than 20 feet away—SuperCam adds another spectrum to its laser for Raman and time-resolved fluorescence spectroscopy:

A technique partially refined at Los Alamos and the University of Hawaii that provides the molecular makeup of a target, therefore allowing geologists to determine mineralogy and search for organic materials.

SuperCam represents a significant upgrade to the highly successful ChemCam instrument aboard the Curiosity rover, a rolling science laboratory that has helped researchers confirm the presence of water on Mars.

Among other mission objectives, the Mars 2020 rover will help advance knowledge of how future human explorers could use natural resources available on the surface of the Red Planet.

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