

Quick Views of Big Advances

About PSRD

Archive

Search Subscribe

Glossary

Comments

Bounty of Iron Meteorites Found on Mars

Something new and wonderful has appeared in the Meteoritical Bulletin Database—an entire listing of meteorites found on Mars by robotic rovers and their science teams from the years 2005–2017. On November 21, 2017 five specimens received formal name recognition, joining the first meteorite found on Mars, whose name (Meridiani Planum) was approved in 2005. The six meteorites, all irons, have been left *in situ* of course on Mars, but their exact locations, physical characteristics, and geochemical details are known thanks to the bounty of instruments onboard the rovers. We present a table of iron meteorites for your perusal. Click the images for enlargements, and use the Meteoritical Bulletin Database links and News articles to learn more about these intriguing pieces of Solar System history.

Iron Meteorites Found While Exploring Mars	
Photo [Click to Enlarge]	Meteorite Names and Rover Instruments
	Aeolis Mons 001 [Database Link] MSL rover Curiosity - Mastcam, Laser-Induced Breakdown Spectroscopy (LIBS) and Remote Micro-Imager (RMI) on ChemCam [News Item] [PSRD article] This rock was initially given the informal name of "Egg Rock." Image credit: NASA/JPL-Caltech/MSSS.
	Aeolis Mons 002 [Database Link] MSL rover Curiosity - Mastcam, Laser-Induced Breakdown Spectroscopy (LIBS) and Remote Micro-Imager (RMI) on ChemCam [News Item] This rock was initially given the informal name of "Ames Knob." Image credit: NASA/JPL-Caltech/MSSS.
Agolis Palus 001 Agolis Palus 002 Agolis Palus 003	Aeolis Palus 001 [Database Link] MSL rover Curiosity - Mastcam, Remote Micro-Imager on ChemCam [Raw Images from Sol 641] This rock was initially given the informal name of "Littleton." Image credit: NASA/JPL-Caltech/MSSS.
Acolis Palin 002 Acolis Palin 003 Acolis Palin 003	Aeolis Palus 002 [Database Link] MSL rover Curiosity - Mastcam, Remote Micro-Imager on ChemCam [News Item] This rock was initially given the informal name of "Lebanon." Image credit: NASA/JPL-Caltech/MSSS.



Aeolis Palus 003 [Database Link]

MSL rover Curiosity - Mastcam, Remote Micro-Imager on ChemCam [*News Item*] This rock was initially given the informal name of "Lebanon B." Image credit: NASA/JPL-Caltech/MSSS.



Meridiani Planum [Database Link]

MER rover Opportunity - PanCam, Miniature Thermal Emission Spectrometer, Rock Abrasion Tool, Microscopic Imager, Mössbauer Spectrometer, and Alpha Particle X-Ray Spectrometer [*News Item*] [*PSRD article*] Image credit: NASA/JPL/Cornell.

At least 17 other meteorite candidates found on Mars were described in 2015 by James Ashley (Jet Propulsion Laboratory). It's only a matter of time before this list expands.

See Reference:

Meteoritical Bulletin Database

See also:

- Ashley, J. W. (2015) The Study of Exogenic Rocks on Mars—An Evolving Subdiscipline in Meteoritics, *Elements*, v. 11, p. 10-11. [article]
- Martel, L. M. V. (May 2008) Meteorites Found on Mars, *PSRD*, http://www.psrd.hawaii.edu/May08/MetsOnMars.html
- Taylor, G. J. (Nov. 2016) Searching for Ancient Solar System Materials on the Moon, Earth, and Mars, *PSRD*, *http://www.psrd.hawaii.edu/Nov16/solar-system-materials.html*

Written by Linda Martel, Hawai'i Institute of Geophysics and Planetology, for *PSRD*.



[About PSRD | Archive | CosmoSparks | Search | Subscribe |

[Glossary | General Resources | Comments | Top of page] Share



November 2017

http://www.psrd.hawaii.edu

psrd@higp.hawaii.edu