

Mars Exploration Science Monthly Newsletter

A publication of the Mars Program Office and the Mars Exploration Program Analysis Group (MEPAG)

July 2019

Mars Science News

Ninth International Conference on Mars – Additional information added to website

The Ninth International Conference on Mars will be held at the California Institute of Technology (Caltech) in Pasadena, California, beginning the morning of Monday, July 22, and ending after a full day on Thursday, July 25. (It will be followed on Friday by [MEPAG Meeting 37](#), see below.) Information regarding [transportation options to Caltech/parking](#) and further [guidance for attendees](#) has been added to the 3rd announcement text. Further information for attendees and a list of optional events (including a Wednesday evening public talk by Dr. Steven Squyres on MER's science legacy) will be added to the website in the next week. For all conference information, please see <https://www.hou.usra.edu/meetings/ninthmars2019/>.

Additionally, we remind attendees about the upcoming Registration Deadline: **July 11**. Although on-site registration will be offered, we strongly encourage [advance registration](#) to help with planning and badge printing.

2nd Informational Circular for MEPAG Meeting 37 (following 9th Mars Conference) is available

The next face-to-face MEPAG meeting (#37) will be held at the California Institute of Technology in Pasadena, CA on Friday, July 26, 8:30-1:00pm PDT, following the Ninth International Conference on Mars (above). The 2nd Informational Circular will be posted at <https://mepag.jpl.nasa.gov/meetings.cfm?expand=m37> and contains a draft agenda, Adobe Connect webcast connection, and transportation options to Caltech/parking information.

If you will attend in-person, please register at <https://docs.google.com/forms/d/e/1FAIpQLSeSC4QLzLtu42-qbgMCyjjyNPdNRd2Mbtumt6ZWdAg6WWUhw/viewform?vc=0&c=0&w=1> by **July 11**. (If you indicated attendance to the MEPAG meeting in your 9th Mars Conference registration, we will use that information and you do not need to re-register.) As for the 9th Mars Conference, on-site registration will be offered, but we strongly encourage advance registration to help with planning and badge printing.

Presentations and Summary from MEPAG Virtual Meeting VM5 posted

Presentations from the 5th MEPAG Virtual Meeting (VM5), and the Meeting Summary, were posted June 18th at <https://mepag.jpl.nasa.gov/meetings.cfm?expand=vm5>. This MEPAG virtual meeting was held Thursday, June 6th, 2019.

Ice and Climate Evolution Science Analysis Group (ICE-SAG) Final Report available shortly

The Ice and Climate Science Analysis Group (ICE-SAG) Preprint report was released at the end of May, 2019. This report has since been updated, including fixed links and formatting, and additional explicit tracing between described mission concepts and the high-priority science areas. Additionally, Appendix C has been added, containing a full listing of Mars ice and climate science questions discussed within early ICE-SAG discussions. The ICE-SAG Final Report will be posted within the next week at <https://mepag.jpl.nasa.gov/reports.cfm?expand=topical>.

Inclusive Astronomy 2 Conference: Abstract Submission/Pre-Registration

The Inclusive Astronomy 2 Conference will be held from October 14-15, 2019, at the Space Telescope Science Institute in Baltimore, MD. Like the first Inclusive Astronomy conference, IA2 will serve as a venue to advocate and provide resources for the inclusion in the astronomy community of people of color; LGBTQIA+ people; people with disabilities; women; and everyone who holds more than one of these underrepresented identities. Come take part in a community discussion to reflect on the state of the profession and envision how to improve it into the 2020s. Pre-registration and abstract submission for IA2 are now open, and due by Friday, **July 19, 2019**. To pre-register and submit an abstract, please fill out the form here: <https://tiny.cc/IA2PreReg>.

Note that pre-registration is mandatory for attendance at the conference. For more information, please visit the website pages about registration and abstract submission. Direct any questions to Inclusion2@stsci.edu - and spread the word!

Python in Planetary Science Survey

We are trying to assess the current state of Python usage and tools coverage for planetary science applications. If you use software to conduct research in planetary science, please take the short, anonymous survey linked below. The results from this survey will be reported back to the community in an open access paper, support funding requests, and help drive future software tool development.

Survey link: <https://bit.ly/2N0sjQG> (goes to a google form) Questions may be directed to: chase@millionconcepts.com.

NASA's Exploration Science Forum Program Now Online

The Solar System Exploration Research Institute (SSERVI) is pleased to announce that the draft NESF schedule is now posted at: <https://nesf2019.arc.nasa.gov/program>

The 6th annual NASA Exploration Science Forum (NESF) will be held in-person July 23-25, 2019 at NASA Ames Research Center, Moffett Field, CA. This year's Forum will feature scientific discussions of human exploration targets of interest (the Moon, near-Earth asteroids, and the moons of Mars). Science sessions will focus on recent mission results and in-depth analyses of science and exploration studies. Dedicated side-conferences for graduate students and young professionals will coincide with the ESF. Public engagement discussions will be interwoven among science topics as well.

This year marks the 50th anniversary of the Apollo 11 splashdown, and on July 24 SSERVI will bus interested Forum attendees to the USS Hornet, the US aircraft carrier that recovered the Apollo 11 crew and capsule, for a special program. All Forum attendees are welcome to join. Please indicate your interest on the registration page if you would like to attend this exciting Apollo 11 50th anniversary event!

Mars-relevant Special Issues Welcoming Paper Submissions

- The open-access journal *Atmospheres* (ISSN 2073-4433) is currently accepting contributions to the special issue "Modeling and Simulation of Planetary Atmospheres". If necessary, reasonable time extensions may be negotiated before the due date by contacting the Managing Editor (Colin Chen colin.chen@mdpi.com) or the Guest Editor (Tim Dowling dowling@louisville.edu). https://www.mdpi.com/journal/atmosphere/special_issues/planetary_atmospheres
Submission deadline: 16 August 2019
- The journal *Life* (ISSN 2075-1729) is currently running a special issue titled "Planetary Exploration of Habitable Environments." Prof. Dr. Dirk Schulze-Makuch, Technical University of Berlin (Germany), and Dr. Alberto G. Fairén, Centro de Astrobiología (Madrid, Spain) and Cornell University (Ithaca, N.Y.), are serving as guest editors for this issue. For more information: https://www.mdpi.com/si/life/Planetary_Exploration
Submission deadline: 15 October 2019

Near-term Due Dates (next three months)

Due	Project
July 12	ASCE Earth & Space Conference – Abstract Deadline
July 19	Inclusive Astronomy 2 Conference – Abstract and required pre-registration Deadline
August 10	Venera-D Landing Sites and Cloud Layer Habitability workshop – Abstract Deadline

UPCOMING CONFERENCES

A note about "conferences" and this calendar of events

Missing NCTS#s (and forecasting deadline, if anomalous) can be sent to Barbara Saltzberg (Barbara.A.Saltzberg@jpl.nasa.gov). If no deadline is noted: it is usually 60 days in advance for domestic meetings — sometimes further in advance if the conference is "Heavily Attended."

Please do not assume our noting of NCTS# is complete. If you are unsure whether an event is a conference or not, or when the forecasting deadline may be, please consult with your NASA Center conference forecasting/travel unit.

Third Quarter, 2019		
	July 7-12, 2019 Sapporo, Japan	82nd Annual Meeting of The Meteoritical Society (MetSoc 2019) https://www.metsoc19-sapporo.com/
	July 8-12, 2019 Oxford, United Kingdom	International Planetary Probe Workshop 2019 , NCTS 36747-19 https://ippw2019.uk/
	July 14-18, 2019 Laurel, MD, USA	The Pluto System After New Horizons (PSANH) , NCTS 31320-19 https://www.hou.usra.edu/meetings/plutosystem2019/
	July 15-17, 2019 Columbia, MD, USA	Lunar ISRU 2019 - Developing a New Space Economy through Lunar Resources and Their Utilization https://www.hou.usra.edu/meetings/lunarisru2019/
	July 22-26, 2019 Pasadena, CA, USA	Ninth International Conference on Mars , NCTS 31488-19 https://www.hou.usra.edu/meetings/ninthmars2019/
	July 23-25, 2019 Moffett Field, CA, USA	NASA Exploration Science Forum 2019 , NCTS 36800-19 https://nesf2019.arc.nasa.gov/
	July 28-August 2, 2019 Singapore	16th Annual Meeting of the Asia Oceania Geosciences Society (AOGS) , NCTS 36817-19 http://www.asiaoceania.org/aogs2019/public.asp?page=home.htm
	August 7-9, 2019 Flagstaff, AZ, USA	10th Planetary Crater Consortium www.planetarycraterconsortium.nau.edu/
	September 8-12, 2019 Big Sky, MT, USA	The First Billion Years: Habitability: Producing Conditions Conducive to Life , NCTS 28519-20 https://www.hou.usra.edu/meetings/habitability2019/
	September 10-12, 2019 Irvine, CA, USA	NASEM's Committee on Astrobiology and Planetary Science (CAPS) http://sites.nationalacademies.org/SSB/SSB_067577#Meetings_and_Events
	September 10-13, 2019 Rome, Italy	International Association of Sedimentologists (IAS) <i>* Session 7.14 Planetary Sedimentary Geology: from remote sensing and in-situ</i> http://iasroma2019.org/
	September 15-20, 2019 Geneva, Switzerland	Joint Meeting: 51st Meeting of the AAS Division for Planetary Sciences (DPS), joint with the European Planetary Science Congress (EPSC) , NCTS 37080-19 https://www.epsc-dps2019.eu/
	September 22-25, 2019 Phoenix, AZ, USA	2019 GSA Annual Meeting , NCTS 37526-19 https://www.geosociety.org/GSA/Events/Annual_Meeting/GSA/Events/gsa2019.aspx
	September 23-25, 2019 Madrid, Spain	Titan after Cassini-Huygens Workshop , NCTS 37783-19 https://www.cosmos.esa.int/web/titan-after-cassini-huygens/home
	September 30-October 3, 2019 Brasilia, Brazil	Large Meteorite Impacts and Planetary Evolution VI (LMI VI) https://www.hou.usra.edu/meetings/lmi2019/

Fourth Quarter, 2019		
NEW	October 14-15, 2019 Baltimore, MD, USA	Inclusive Astronomy 2 Conference https://outerspace.stsci.edu/display/IA2
	October 21-25, 2019 Washington, DC, USA	70th International Astronautical Congress (IAC) , NCTS 36775-20 https://www.iac2019.org/
	October 28-30, 2019 Saratoga Springs, NY, USA	2nd RPI Space Imaging Workshop http://seal.rpi.edu/workshop/2019
	October 28-30, 2019 Washington, DC USA	Lunar Exploration Analysis Group (LEAG) meeting https://www.lpi.usra.edu/leag/
	November 4-8, 2019 Herzliya, Israel	The 4th COSPAR Symposium: Small Satellites for Sustainable Science and Development , NCTS 37773-20 http://www.cospar2019.org/

Fourth Quarter, 2019 continued		
	November 5-8, 2019 Carlsbad, NM, USA	Mars Extant Life: What's Next? https://www.hou.usra.edu/meetings/lifeonmars2019/
	November 5-7, 2019 Tucson, AZ, USA	Asteroid Science in the Age of Hayabusa 22 and OSIRIS-REX https://corex.lpl.arizona.edu/international-workshop
	December 9-12, 2019 Sugar Land, TX, USA	First International Orbital Debris Conference (IOC) https://www.hou.usra.edu/meetings/orbitaldebris2019/
	December 9-13, 2019 San Francisco, CA, USA	2019 AGU Fall Meeting , NCTS 37409-20 https://fallmeeting.agu.org/2018/future-meetings/

2020		
NEW	January 6-8, 2020 Cambridge, England	KICC: Rocky Worlds: from the Solar System to Exoplanets https://www.kicc.cam.ac.uk/events/rocky-worlds-from-the-solar-system-to-exoplanets
NEW	January 13-17, 2020 Ushuaia, Tierra del Fuego, Argentina	7th International Conference on Mars Polar Science and Exploration https://www.hou.usra.edu/meetings/marspolar2020/
NEW	January 20-22, 2020 London, England	Ice Giants Systems 2020 https://ice-giants.github.io/
NEW	February 11-13, 2020 Houston, TX, USA	LPI Workshop: The impact of lunar dust on human exploration https://www.hou.usra.edu/meetings/lunardust2020/
NEW	March 16-20, 2020 The Woodlands, TX, USA	LPSC https://www.hou.usra.edu/meetings/lpsc2020/
NEW	April 20-23, 2020 Seattle, WA, USA	ASCE Earth & Space Conference Symposium 2: Exploration and Utilization of Extra-Terrestrial Bodies https://www.earthspaceconference.org/symposium-2
NEW	May 3-8, 2020 Les Houches, France	Workshop Mars V https://www.cosmos.esa.int/web/planet-mars-5/home
NEW	May 12-15, 2020 Alamosa, CO, USA	6th International Planetary Dunes Workshop https://www.hou.usra.edu/meetings/dunes2020/
NEW	June 2-4, 2020 Orleans, France	Mercury 2020 Current and future science of the innermost planet https://mercury2020.ias.u-psud.fr/main_1st.php
NEW	August 15-23, 2020 Sydney, Australia	43rd COSPAR Scientific Assembly https://www.cospar-assembly.org/

Seasons on Mars

	MY34	MY35	MY36
Start of Northern Spring / L. 0	03/23/2019	02/07/2021	12/26/2022
Start of Northern Summer / L. 90	10/08/2019	08/25/2021	07/13/2023
Start of Northern Autumn / L. 180	04/08/2020	02/24/2022	01/24/2024
Start of Northern Winter / L. 270	09/02/2020	07/21/2022	06/07/2024

Special holidays to consider when scheduling conferences/workshops/meetings

Good Friday	4/19/2019	4/10/20	4/2/2021	04/15/2022
Rosh Hashanah	9/30/2019	9/19/20	9/7/2021	09/26/2022
Yom Kippur	10/09/2019	9/28/20	9/16/2021	10/05/2022
(Note that Jewish holidays start at sundown the previous evening)				
Thanksgiving Day, Canada	10/14/2019	10/12/20	10/11/2021	10/10/2022
Thanksgiving Day, U.S.	11/28/2019	11/26/20	11/25/2021	11/24/2022
Christmas Day	12/25/2019	12/25/20	12/25/2021	12/25/2022

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Please send Mars Community Announcements and calendar items for inclusion in next month's newsletter to:

Barbara Saltzberg at Barbara.a.Saltzberg@jpl.nasa.gov

This newsletter (and all previous months') is also posted on the MEPAG website: <http://mepag.jpl.nasa.gov>

- If you wish to withdraw from the electronic mailing list this newsletter is sent out to, please send an email from your email account to mepag-removesignup@jpl.nasa.gov.
- To be added to this list and receive this monthly newsletter and other Mars Science announcements, or to update your MEPAG directory information (which contains the email list used for sending out this newsletter), please fill out the online form: mepag-signup@jpl.nasa.gov (also linked on the MEPAG website <http://mepag.nasa.gov/>, under Updates).