

Suzanne E. Smrekar

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Education

*B.S. Geophysics/Math, Brown University, Providence, RI, 1984.
Ph.D. Geophysics, Southern Methodist University, Dallas, TX, 1990.*

Professional Experience

*PI, VERITAS Mission, 6/2021-present
Deputy PI, InSight Mission, 2012-2025.
Deputy PI, Heat Flow and Physical Properties Probe (HP3), InSight, 2012-present.
Senior Research Scientist, Jet Propulsion Laboratory, NASA, Nov. 2013
Mars '05 Mars Reconnaissance Orbiter, Deputy Project Scientist, 2001-2012.
Venus Express, Participating Scientist co-I w/Bob Carlson, 2005-present.
Mars '09 Smart Lander Study Scientist, 2001.
New Millennium, Deep Space 2, Mars Microprobe Project Scientist, JPL, 1995-2000.
Co-I, Champollion Physical Properties Probe, 1995-1999.
Mars Micromission Study Scientist, 1998-1999.
Postdoctoral Associate, Dept. of Earth, Atmos., and Planet. Sci., MIT, 1990-1992.*

Awards

*American Geophysical Union Whipple Award in Planetary Science, 2024
JPL Magellan Award for leadership, 2022
NASA Outstanding Public Leadership Medal, 2020
JPL People Leadership: 'Scientific leadership, mentoring, public outreach on InSight' 2019
Emmy Award Team: 'Outstanding Original Interactive Program' for InSight Landing, 2019
Elected to International Academy of Astronautics, 2015
NASA Exceptional Scientific Achievement Medal, Recent Volcanism on Venus, 2012.
NASA Exceptional Achievement Medal, for Mars Reconnaissance Orbiter Science Planning, 2007.
Presidential Early Career Award for Scientists and Engineers Nominee, 1996.
NASA Group Achievement Awards: 1) Magellan Science Group, 1993; 2) Mars Reconnaissance Orbiter Project: Development and Flight Development Team, 2006; 3) MSL Relay Operations Team, 2013; 4) InSight Science Operations and Enhancement Team, 2020*

Professional Activities

*Postdoctoral Advisor, 1998-present: Mary Urquhart, Scott Anderson, Trudi Hoogenboom, Alice Guest, Daniel Nunes, Serina Diniega, Matthew Siegler, Leah Sabbath, Joseph Schools, Anna Gulcher, Andrea Adams
Venus Science Coordination Group (VESCOOR) member, 2024-present
National Academy of Science Decadal Survey Mid-Term Update Panel, 2017-2018.
JPL Senior Research Science Council, Chair, Diversity & Inclusion Subcommittee, 2018-2021.
Editorships:
Venus: Evolution through time, Intern. Space Science Inst., co-editor, 2024.*

Venus III book co-editor, 2020.
Associate Editor, *Journal of Geophysical Research (Planets)*, 1997-2001.
Icarus Special Issue Guest Editor: *Advances in Venus Science*, 2010.
Venus Exploration and Analysis Group committees: 1) Road mapping, 2) Goals, Initiatives, and Objectives, 2012-present
Venus Exploration and Analysis Group Co-chair, 2009-2011.
AGU Hess Medal Nominating Committee.
International Lunar Network Science Definition Team, 2008.
Postdoctoral Advisor, 1998-present: Mary Urquhart, Scott Anderson, Trudi Hoogenboom, Alice Guest, Daniel Nunes, Serina Diniega, Matthew Siegler, Leah Sabbath, Joseph Schools, Anna Gülcher, Andrea Adams
Undergraduate Student Mentor: dozens of students since 1995.
Mars '09 Smart Lander Science Advisory Group, 2002.
Mars '09 Smart Lander Science Definition Team Deputy Chairperson, 2001.
Mars Reconnaissance Orbiter Science Definition Team, 2001.
Associate Editor, *Journal of Geophysical Research (Planets)*, 1997-2001.
NASA Campaign Strategies Working Group, *Formation and Dynamics of Earth-like Planets*, 1998-2002.
Planetary Geology and Geophysics Undergrad. Res. Program Advisor, 1995-2001.
Secretary for the Planetology Section of the American Geophysical Union, 1994-1996.
NASA Planetary Geology and Geophysics and Mars Data Analysis Review Panel
Executive Secretary for NASA's Mars Science Working Group, 1994-1996.

Scientific Organizing Committees:

International Space Science Institute Workshop: Venus – Evolution Through Time, 2020
Comparative Tectonics and Geodynamics of Venus, Earth, and Rocky Exoplanets, 2015
Comparative Climatology of the Terrestrial Planets, 2012.
7th International Conference on Mars, 2007.
2nd International Workshop: *Exploring Mars and its Earth Analogues*, 2007.
Lunar and Planetary Science Conf., 1994, 2007.
AGU Chapman Conference: *Venus as a Terrestrial Planet*, 2006.
Mars Exploration Program and Sample Return Missions, Paris, 2/1999.
Mars Micromissions Workshop, Paris, 5/1998; 2/1999.
Conference on Mars Polar Science and Exploration, Houston, 10/1998.
AGU Chapman Conference: *Geodynamics of Venus*, Aspen, 9/1997.
Digital Avionics System Conf., *Micro-science: Instruments/ small spacecraft*, Irvine, CA, 10/1997.
American Geophysical Union Fall Meeting, 1994, 1995, 1996.

Selected Recent Public Outreach

Nova, PBS/BBC 'Solar System: Volcano Worlds', 2024
CBS Saturday Morning Show, 'Venus advocate' 1/25/2020
Rolling Stone Magazine, 'Women of NASA', 3/19 issue
Nova, PBS/BBC 'The Planets: Inner Worlds', 2019
Planetary Radio, *Giving Mysterious Venus the Love (and Science) She Deserves*, 8/2018
InSight Mission, numerous events leading up to landing on 11/26/18
BBC Horizons, 'The Wildest Weather in the Universe', 2016
NPR commentary on 'The Martian' book, 2016
AGU Planetary Science Interview 2012

'Venus: Earth's Evil Twin or Just Misunderstood?' Griffith Observatory, 6/2012.
BBC Horizons, season 48, episode 15: The transit of Venus, 6/2012

Professional Societies

American Geophysical Union, 1987-present

Publications

1. Sulcanese, D.**, G. Mitri, C. Cioria, E. S. Mormile, M. Ianiri, S. E. Smrekar, S. Hensley, Geological insights into local subduction and spreading on Venus, submitted 2025.
2. Kerr, M.C, D.R. Stegman, S.E. Smrekar, and A.C. Adams, The glass ceiling convective regime and the origin and diversity of coronae on Venus, submitted, 2025.
3. Gülcher, A.J.P., L. Sabbeth, E. Stofan, S.E. Smrekar, Coronae on Venus: an updated global database and insights into morphology, spatial distribution, geological setting, and lithospheric properties, *J. Geophys. Res. Planets*, in press, 2025.
4. Gülcher, A.J.P., M. Gurnis, S.E. Smrekar, Dynamics of Venusian rifts and their interactions with plumes and intrusions, submitted, 2025.
5. Cascioli, G. A.J.P. Gülcher, E. Mazarico, S.E. Smrekar, A spectrum of tectonic processes at coronae on Venus revealed by gravity and topography, *Science Advances*, in press, 2025.
6. Giuliani, F., D. Durante, G. Cascioli, F. DeMarchi, L. Iess, E. Mazarico and S. Smrekar, Mapping Venus's gravity field with the VERITAS Mission, *Planet. Sci. J.* (2025) DOI:10.3847/PSJ/ad991a.
7. Smrekar, S.E., Ostberg, C. & O'Rourke, J.G. Author Correction: Earth-like lithospheric thickness and heat flow on Venus consistent with active rifting. *Nat. Geosci.* (2024). <https://doi.org/10.1038/s41561-024-01595-y>.
8. Fernando, B., Newman, C., Daubar, I.J., C. Beghein, N.L. Chabot, J.C.E. Irving, C.L. Johnson, M.P. Panning, A.Plesa, A.S. Rivkin, S. Smrekar, and W.B. Bandert, Evaluation of the InSightSeers and DART Borders mission observer programmes. *Nat Astron* (2024). <https://doi.org/10.1038/s41550-024-02434-1>
9. Alemanno, G., A. Maturilli, J. Helbert, M. D. Dyar, S. Adeli, C.J. Leight, M. McCanta, O. Barraud, A. Van Den Neucker, L. Breitenfeld, S. Smrekar, E. Marcq, S. Robert, A. Vandaele, Spectral mixing analysis of laboratory emissivity spectra for improved VenSpec-M/VEM data interpretation, SPIE, Conference: Infrared Remote Sensing and Instrumentation XXXII (2024) DOI: [10.1117/12.3027471](https://doi.org/10.1117/12.3027471)
10. Garland, S.P., S. Adeli, N. Müller, C. Althaus, M. D. Dyar, S. E. Smrekar, D. C. Nunes, A. Domac, G. Alemanno, O. Barraud, A. Maturilli, C. W. Hamilton, F. Trauthan, D. Wendler, T. Hagelschuer, R. Demirok, S. Chauhan, G. Peter, J. Helbert, The Venus Emissivity Mapper Emulator 2.0: a NIR camera system for Venus analogue field measurements *Proceedings Volume 13144, Infrared Remote Sensing and Instrumentation XXXII*: 131440I (2024) <https://doi.org/10.1117/12.3028083>
11. Spohn, T., Müller, N., Knollenberg, J., Grott, M., Golombek, M. P., Plesa, A.-C., et al. (2024). Mars soil temperature and thermal properties from InSight HP3 data. *Geophys. Res. Lett.*, 51, <https://doi.org/10.1029/2024GL108600>.
12. Capitanio, F. A., M. Kerr, D.R. Stegman and S.E. Smrekar, Ishtar Terra highlands on Venus raised by craton-like formation mechanisms. *Nat. Geosci.* <https://doi.org/10.1038/s41561-024-1485-3> (2024).
13. Capitanio, F.A. and S.E. Smrekar, Plateau formation on Venus similar to early continent formation on Earth, *Research Briefing, Nat. Geosci.*, v. 17, p. 717–718 (2024).
14. Ghail, R. C., Smrekar, S. E., Widemann, T., Byrne, P. K., Gülcher, A. J. P., O'Rourke, J. G., Borrelli, M. E., Gilmore, M. S., Herrick, R. R., Ivanov, M. A., Plesa, A. C., Rolf, T., Sabbeth, L., Schools, J. W., & G.J.schoo Shellnutt, (2024). Volcanic and Tectonic Constraints on the Evolution of Venus. *Space Science Reviews*, 220(4), Article 36. <https://doi.org/10.1007/s11214-024-01065-2>

15. Le Contellec, A., C. Michaut, F. Maccaferri, V. Pinel, F. Chambat, and S. Smrekar, *Insights into Venus' crustal plateaus from dyke trajectories below craters*, JGRP, <https://doi.org/10.1029/2023JE008189>, 2024.
16. Sabbeth, L., M.A. Carrington, S.E. Smrekar, *Constraints on corona formation from an analysis of topographic rims and fracture annuli*, *Earth Planet. Sci. Lett.*, 10.1016/j.epsl.2024.118568, 2024.
17. Schools, J., and S. E. Smrekar, *Formation of Coronae Topography and Fractures via Plume Buoyancy and Melting*, *Earth Planet. Sci. Lett.*, doi:10.1016/j.epsl.2024.118643, 2024.
18. Capitanio, F. A., M. Kerr, D.R. Stegman and S.E. Smrekar, *Origin of Ishtar Terra from a craton formation mechanism on Venus*, *Nat. Geosci.* <https://www.nature.com/articles/s41561-024-01485-3>.
19. Widemann, T., S.E. Smrekar, Garvin, J.B., et al., *Venus Evolution through time: key science questions, selected mission concepts and future investigations*, *Space Sci Rev* 219, 56 (2023). <https://doi.org/10.1007/s11214-023-00992-w>.
20. Carter, L.M., Gilmore, M.S., Ghail, R.C., P.K. Byrne, S.E. Smrekar, T.M. Ganey, and N. Izenberg, *Sedimentary Processes on Venus*. *Space Sci Rev* 219, 85 (2023) <https://doi.org/10.1007/s11214-023-01033-2>.
21. Adams, A. C., Stegman, D. R., Mohammadzadeh, H., Smrekar, S. E., & Tackley, P. J. (2023). *Plume-induced delamination initiated at rift zones on Venus*. *Journal of Geophysical Research: Planets*, 128, e2023JE007879. <https://doi.org/10.1029/202310.1029/2023JE007879>.
22. Cascioli, G, J.P Renaud, E. Mazarico, D. Durante, I. Iess, S. Goossens, S. Smrekar, *Constraining the Venus Interior Structure with Future VERITAS Measurements of the Gravitational Atmospheric Loading*, *Planet. Sci. J.*, <http://dx.doi.org/10.3847/PSJ/acc73c>, 2023.
23. Grott, M; Piqueux, S; Spohn, T; Knollenberg, J; Krause, C; Marteau, E; Hudson, TL; Forget, F; Lange, L; Muller, N; Golombek, M; Nagihara, S; Morgan, P; Murphy, JP; Siegler, M; King, SD; Banfield, D; Smrekar, SE; Banerdt, WB, *Seasonal Variations of Soil Thermal Conductivity at the InSight Landing Site*, *Geophys. Res. Lett.*, 80, <http://dx.doi.org/10.1029/2023GL102975>, 2023.
24. Herrick, RR; Bjonnes, ET; Carter, LM; Gerya, T; Ghail, RC; Gillmann, C; Gilmore, M; Hensley, S; Ivanov, MA; Izenberg, NR; Mueller, NT; O'Rourke, JG; Rolf, T; Smrekar, SE; Weller, MB, *Resurfacing History and Volcanic Activity of Venus*, *Space Sci. Rev.*, 219, <http://dx.doi.org/10.1007/s11214-023-00966-y>, 2023.
25. Le Maistre, S. and 24 authors, *Spin state and deep interior structure of Mars from InSight radio tracking*, *Nature*, <https://doi.org/10.1038/s41586-023-06150-0>, 2023.
26. Sabbeth, L. S. E. Smrekar, and J. Stock, *Estimated seismicity of Venusian wrinkle ridges based on fault scaling relationships*, *EPSL*, 619, <http://dx.doi.org/10.1016/j.epsl.2023.118308>, 2023.
27. Sabbeth, L. S. E. Smrekar, and J. Stock, *Using InSight Data to Calibrate Seismicity From Remote Observations of Surface Faulting*, *J. Geophys. Res.*, 128, <http://dx.doi.org/10.1029/2022JE007686>, 2023.
28. Smrekar, S.E., C. Ostberg, J.G. O'Rourke, *Earth-like lithospheric thickness and heat flow on Venus consistent with active rifting*, *Nat. Geosci.* 16, p. 13-18, doi: 10.1038/s41561-022-01068-0, 2023.
29. Adams, A., D. Stegman, S.E. Smrekar, and P. J. Tackley, *Regional-Scale Lithospheric Recycling on Venus via Peel-Back Delamination*, *J. Geophys. Res. Planets*, 127, e2022JE007460. <https://doi.org/10.1029/2022JE007460>, 2022.
30. Cascioli, G., D. Durante, E. Mazarico, M. Wallace, S. Hensley, S. Smrekar, *Improving the VERITAS Orbit Reconstruction Using Radar Tie Points*, *J. Spacecraft and Rockets*, <http://dx.doi.org/10.2514/1.A35499>, 2022.
31. Huang, Q. C., et al., *Seismic detection of a deep mantle discontinuity within Mars by InSight*, *Proc. Nat. Acad. Sci.*, 119, 2022. <http://dx.doi.org/10.1073/pnas.2204474119>

32. Hensley, S., M. S. Wallace, J. Martin, D. Perkovic-Martin, S. Smrekar, M. Younis, M. Lachaise, P. Prats, M. Rodriguez, H. Zebker, B. Campbell, M. Mastrogiuseppe, *Planned Differential Interferometric SAR Observations at Venus by the Veritas Mission*, *Proceedings of IGARSS 2022, International Geoscience and Remote Sensing Symposium*, Kuala Lumpur, Indonesia, 17-22 July, 2022.
33. Rolf, T; Weller, M; Gulcher, A; Byrne, P; O'Rourke, JG; Herrick, R; Bjonnes, E; Davaille, A; Ghail, R; Gillmann, C; Plesa, AC; Smrekar, S. *Dynamics and Evolution of Venus' Mantle Through Time*. *Space Sci Rev* 218, 70 (2022). <https://doi.org/10.1007/s11214-022-00937-9>
34. Smrekar, S., *VERITAS (Venus Emissivity, Radio Science, InSAR, Topography, and Spectroscopy): A Discovery Mission*, *Institute for Electrical and Electronics Engineers (IEEE) Aereospace Conf. Aereospace Conf.*, DOI: 10.1109/AERO53065.2022, 2022.
35. Spohn, T., Hudson, T.L., Marteau, E. et al. *The InSight HP3 Penetrator (Mole) on Mars: Soil Properties Derived from the Penetration Attempts and Related Activities*. *Space Sci Rev* 218, 72 (2022). <https://doi.org/10.1007/s11214-022-00941-z>
36. Thorne, SN; Johnson, CL; Mittelholz, A; Langlais, B; Lorenz, R; Murdoch, N; Spiga, A; Smrekar, SE; Banerdt, WB, *Investigation of magnetic field signals during vortex-induced pressure drops at InSight*, *Planetary and Space Sci.*, 217, <http://dx.doi.org/10.1016/j.pss.2022.105487>, 2022.
37. Wieczorek, M.A. et al., *InSight Constraints on the Global Character of the Martian Crust*, *J. Geophys. Res. Planets*, 127, 2022. <http://dx.doi.org/10.1029/2022JE007298>
38. Stähler, S.C, A.Khan, W. B. Banerdt, et al., *Seismic detection of the martian core*, *Science*, 373, , <http://dx.doi.org/10.1126/science.abi7730>, 2021.
39. Borrelli, M.E., J. G. O'Rourke, S.E. Smrekar, and C.M. Ostberg, *A global survey of lithospheric flexure at steep-sided domical volcanoes on Venus reveals intermediate elastic thicknesses*, *J. Geophys. Res. Planets*, 126, 7, doi: 10.1029/2020JE006756, 2021.
40. Cascioli, G., F. De Marchi, P. Racioppa, D. Durante, L. Iess, S. Hensley, E. Mazarico, S. Smrekar, *The determination of the rotational state and interior structure of Venus with VERITAS*, *Planetary Science J.*, doi:10.3847/PSJ/ac26c0, 2021.
41. Ceylan, S., and 25 other authors, *Companion guide to the marsquake catalog from InSight, Sols 0-478: Data content and non-seismic events*, doi: 10.1016/j.pepi.2020.106597, 2021
42. Clinton, J.F. and 25 other authors, *The Marsquake catalogue from InSight, sols 0-478*, *Phys. Earth Planet. Int.*, doi: 10.1016/j.pepi.2020.106595, 2021.
43. Drilleau, M. and 29 other authors, *MSS/1: Single-Station and Single-Event Marsquake Inversion*, *Earth Space Sci.*, doi: 10.1029/2020EA001118, 2021.
44. Dyar, M.D., J. Helbert, R.C. Cooper, E.C. Sklute, A. Marurilli, N.T. Mueller, D. Kappel, S.E. Smrekar, *Surface weathering on Venus: Constraints from kinetic, spectroscopic, and geochemical data*, *Icarus*, DOI: 10.1016/j.icarus.2020.114139, 2021.
45. Grott, M., T. Spohn, J. Knollenberg, C. Krause, T. L. Hudson, S. Piqueux., N. Müller, M. Gollonbek, C. Vrettos, E. Marteau, S. Nagihara, P. Morgan, J. Murphy, M. Siegler, S. King, S. E. Smrekar, and W. B. Banerdt, *Thermal conductivity of the Martian regolith at the InSight landing site from HP3 active heating experiment*, *Geophys. Res. Planets*, [tps://doi.org/10.1029/2021JE006861](https://doi.org/10.1029/2021JE006861), 2021.
46. Ojha, L; Karimi, S; Buffo, J; Nerozzi, S; Holt, JW; Smrekar, S; Chevrier, V., *Martian Mantle Heat Flow Estimate From the Lack of Lithospheric Flexure in the South Pole of Mars: Implications for Planetary Evolution and Basal Melting*, *Geophys. Res. Lett.*, 48, doi: 10.1029/2020GL091409, 2021.
47. Maki, J.N., M. Golombek, W. Banerdt, S. Smrekar, R. Deen, H. Abarca, S. Lu, J. Hall, *Color Properties at the Mars InSight Landing Site*, *Earth Space Science*, doi: 10.1029/2020EA001336, 2021.
48. Mittelholz, A., and 11 other authors, *The Origin of Observed Magnetic Variability for a Sol on Mars From InSight*, *J. Geophys. Res. Planets*, doi: 10.1029/2020JE006505, 2021.

49. Mittelholz, A., C. L. Johnson, M. Fillingim, S. P. Joy, J. Espley, J. Halekas, S. Smrekar, W. B. Banerdt
Space weather observations with InSight, *Geophys. Res. Lett.*, Doi: 10.1029/2021GL095432, 2021.
50. Sharon K., M. P. Panning, S.E. Smrekar, S.C. Stähler, S.D. King, M.P. Golombek, M. Manga, B.R. Julian, B. Shiro, C. Perrin, J. A. Power, C. Michaut, S. Ceylan, D. Giardini, P. Lognonne, W. B. Banerdt, Analyzing Low Frequency Seismic Events at Cerberus Fossae as Long Period Volcanic Quakes, *JGR-P*, 126, e2020JE006518. <https://doi.org/10.1029/2020JE006518>, 2021.
51. Mittelholz, A., Johnson, C.L., Thorne, S.N., Joy, S., Barrett, E., Fillingim, M.O.; Forget, F.; Langlais, B.; Russell, C.T.; Spiga, A.; Smrekar, S.; Banerdt, W.B., The Origin of Observed Magnetic Variability for a Sol on Mars From InSight, *JGR-P*, DOI: 10.1029/2020JE006505, 2020.
52. Mueller, N.T., Knollenberg, J., Grott, M., Kopp, E., Walter, I., Krause, C., Hudson, T., Spohn, T., Smrekar, S., Calibration of the HP3 Radiometer on InSight, *Earth Space Sci.*, DOI: 10.1029/2020EA001086, 2020.
53. Drilleau, M. and 31 other authors, MSS/1: Single-Station and Single-Event Marsquake Inversion, *Earth and Space Sci.*, DOI: 10.1029/2020EA001118, 2020.
54. Banerdt, W.B. & S.E. Smrekar (co-1st authors), and 40 other authors, Initial Results from the InSight Mission, *Nature Geosci.* 13, 183–189, DOI: 10.1038/s41561-020-0544-y, 2020.
55. Banfield, D. & A. Spiga, and 47 authors, First results from InSight's meteorology station on Mars, *Nature Geosci.* DOI: 10.1007/s11214-018-0570-X, 2020.
56. Giardini, D., and 61 authors, The Seismicity of Mars, *Nature Geosci.* 13, 205-212, DOI: 10.1038/s41561-020-0539-8, 2020.
57. Golombek, M., and 49 authors, Geology of the InSight Landing Site on Mars, *Nature Commun.* 11, 1014, DOI: 10.1038/s41467-020-14679-1, 2020.
58. Johnson, C.L. and 20 authors, Crustal and Time-Varying Magnetic Fields at the InSight Landing Site, *Nature Geosci.* 13, 199–204, Doi: 10.1038/s41561-020-0537-x, 2020.
59. Lognonné, P., Banerdt, W.B., Pike, W.T. et al. Constraints on the shallow elastic and anelastic structure of Mars from InSight seismic data. *Nat. Geosci.* 13, 213–220 (2020). <https://doi.org/10.1038/s41561-020-0536-y>, 2020.
60. Mueller, N. T., S. E. Smrekar, C.C. Tsang, Multispectral surface emissivity from VIRTIS on Venus Express, *Icarus*, 335, 113400, doi: 10.1016/j.icarus.2019.113400, 2020.
61. M. Grott T. Spohn, J. Knollenberg, C. Krause, M. Scharringhausen, T. Wippermann, S.E. Smrekar, T.L. Hudson, W.B. Banerdt, Calibration of the Heat Flow and Physical Properties Package (HP 3) for the InSight Mars Mission, *Earth Space Sci.*, 6, 12, doi: 10.1029/2019EA000670, 2019.
62. Ojha, L., S. Karimi, K.W. Lewis, K.W., S.E. Smrekar, and M. Siegler, Depletion of heat producing elements in the Martian mantle, *Geophys. Res. Lett.*, doi: 10.1029/2019GL085234, 2019.
63. Smrekar, S. and 31 other authors, Pre-Mission insights on the interior of Mars, *Space Sci. Rev.* 215:3, doi:10.1007/s11214-018-0563-9, 2019.
64. Dyar, M. D., S.E. Smrekar, and S. R. Kane, The exoplanet next door: How Visiting Venus Will Help Us Find Life on Distant Planets, *Scientific American*, 320, v2, 2019.
65. Banfield, D. and 25 other authors, InSight Auxiliary Payload Sensor Suite (APSS) *Space Sci Rev* (2019) 215:4 <https://doi.org/10.1007/s11214-018-0570-x>, 2019.
66. Lognonne, P., and n other authors, SEIS: The Seismic Experiment for Internal Structure of InSight, *Space Sci. Rev.* In review, 215:xx, doi:10.1007/, 2019.
67. Plesa, A.-C., S. Padovan, N. Tosi, D. Breuer, M. Grott, M.A. Wieczorek, T. Spohn, S.E. Smrekar and W.B. Banerdt, The Thermal State and Interior Structure of Mars, *Geophys. Res. Lett.*, 45, 22, p. 12198-12209, DOI: 10.1029/2018GL080728, 2019.
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70. Smrekar, S., S. Hensley, M.S. Wallace, M.E. Lisano, M.R. Darrach, C. Sotin, and D. Lehman, *Venus Origins Explorer (VOX) Concept: A proposes New Frontiers mission*, *Institute for Electrical and Electronics Engineers (IEEE) Aerospace Conf.*, 1-19, p. 2018.
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72. Helbert, J., D. Dyar, I. Walter, D. Wendler, T. Widemann, E. Marcq, G. Guignan, S. Ferrari, A. Maturilli, N. Mueller, D. Kappel, J. Jaenchen, M. D'Amore, A. Boerner, C. Tsang, G.E. Arnold, S. Smrekar, *The Venus Emissivity Mapper (VEM): obtaining global mineralogy of Venus from orbit*, *Proc. SPIE 10765, Infrared Remote Sensing and Instrumentation XXVI*, 107650D; doi: 10.1117/12.2320112, 2018.
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74. Golombek, M. and 34 other authors, *Selection of the InSight landing site*, *Space Sci. Reviews*, *Space Sci.* 211:5–95, doi: 10.1007/s11214-016-0321-9, 2018.
75. O'Rourke, J.G. and S.E. Smrekar, *Signatures of lithospheric flexure and elevated heat flow in stereo topography at coronae on Venus*, *J. Geophys. Res.*, doi:10.1002/2017JE005358, 2018.
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