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EDUCATION

A.B.: May, 1966, Colgate University (physics).
M.A.: May, 1968, Rice University (geology and geophysics).
Ph.D.: May, 1970, Rice University (geology and geophysics).

SCIENTIFIC WORK

- Most research has been on the petrology and chemistry of lunar samples and meteorites to understand the origin and evolution of the solar system and the planets in it.
- Studies geared to understanding the processes involved in planetary formation and evolution, including nebular and parent body alteration, impact, accretion, and core formation.
- Recent meteorite research focuses on the nature of Martian volcanism as revealed by SNC meteorites and aqueous alteration in SNC meteorites.
- Evolution of the Martian crust as determined from geochemical mapping using data from Mars Odyssey, and theoretical investigations of igneous and aqueous processes.
- Lunar research has concentrated on the origin of igneous lithologies in the lunar highlands, and the bulk composition of the Moon. Member of GRAIL mission science team.
- Have done considerable work on utilizing space resources and on telerobotic geologic exploration of planetary surfaces.

POSITIONS HELD

1990–present: *Research Professor*, Planetary Geosciences, Hawai'i Institute of Geophysics and Planetology, University of Hawai'i at Manoa
1998–2002: *Director*, Hawai'i Space Grant Consortium
1986–1990: *Assistant Director*, Institute of Meteoritics
1976–1990: *Senior Research Scientist*, Institute of Meteoritics and Department of Geology, University of New Mexico, Albuquerque, New Mexico
1973–1976: *Assistant Professor*, Department of Earth and Planetary Sciences, Washington University, St. Louis, Missouri
1970–1973: *Postdoctoral Fellow*, Smithsonian Astrophysical Observatory and Harvard College Observatory, Cambridge, Massachusetts

AWARDS

- Ninninger Meteorite Prize, 1968.
- Sigma Xi Award for Graduate Research, Rice University, 1970.
- *A Close Look at the Moon* selected as one of the outstanding science books for children in 1980 by the National Science Teachers Association and the National Book Council.
- *Volcanoes in Our Solar System* selected as one of the outstanding science books for children in 1983 by the National Science Teachers Association and the National Book Council.
- Carl Sagan Medal for Excellence in Public Communications in Planetary Science, 2008
- Shoemaker Distinguished Lunar Scientist Award (NASA Lunar Science Inst.), 2011

NATIONAL COMMITTEES (abbreviated)

- Member, NASA Review Panels: 8
- Group Chief, NASA Review Panels: 3
- Chair, NASA Review Panels: 23
- Co-Chair (2005), Human Exploration Systems and Mobility Capabilities Roadmapping Team (NASA)
- Chair (2005-2007), Member of Executive Committee (2007-2010), Lunar Exploration Analysis Group (NASA)

REFEREED PUBLICATIONS (selected recent, > 200 total)

Full list available at: <https://www.higp.hawaii.edu/~gjtaylor/GJTpubs.pdf>

Melosh, H. J., Kendall, J., Horgan, B., Johnson, B. C., Bowling, T., Lucey, P. G., and Taylor, G. J. (2017) South Pole-Aitken basin ejecta reveal the Moon's upper mantle. *Geology* **45**, doi: 10.1130/G39375.1

Jansen, J. C., J.C. Andrews-Hanna, Y. Li, P.G. Lucey, G.J. Taylor, S. Goossens, F.G. Lemoine, E. Mazarico, J.W. Head, C. Milbury, W.S. Kiefer, J.M. Soderblom, M.T. Zuber (2017) Small-scale density variations in the lunar crust revealed by GRAIL. *Icarus* **291**, 107-123. doi.org/10.1016/j.icarus.2017.03.017

Hallis, L. J., Huss, G. R., Nagashima, K., Taylor, G. J., Stoffler, D., Smith, C. L., and Lee, M. R. (2017) Effects of shock and Martian alteration on Tissint hydrogen isotope ratios and water content. *Geochim. Cosmochim. Acta* **200**, 280-294. doi.org/10.1016/j.gca.2016.12.035

Zuber, M. T. and 27 others (2016) Gravity Field of the Orientale Basin from the Gravity Recovery and Interior Laboratory Mission, *Science*, v. 354(6311), p. 438-441, doi: 10.1126/science.aag0519

Johnson, B. C. and 13 others (2016) Formation of the Orientale Lunar Multiring Basin, *Science*, v. 354(6311), p. 441-444, doi: 10.1126/science.aag0518.

Robinson, K. L., Barnes, J. J., Nagashima, K., Thomen, A., Franchi, I. A., Huss, G. R., Anand, M., and Taylor, G. J. (2016) Water in evolved lunar rocks: Evidence for multiple reservoirs. *Geochim. Cosmochim. Acta* **188**, 244-260. doi.org/10.1016/j.gca.2016.05.030

Hallis, L. J., Huss, G. R., Nagashima, K., Taylor, G. J., Halldorsson, S. A., Hilton, D. R., Mottl, M. J., and Meech, K. J. (2015) Evidence for primordial water in Earth's deep mantle. *Science* **350**, 795-797.

Taylor, G.J. and Wieczorek, M. (2014) Lunar bulk chemical composition: a post-Gravity Recovery and Interior Laboratory reassessment. *Phil. Trans. Royal Soc.*, doi:10.1098/rsta.2013.0242.

Robinson, K. L. and Taylor, G.J. (2014) Heterogeneous distribution of water in the Moon. *Nat. Geosci.* **7**, 401-408. DOI:10.1038/NGEO2173.

Taylor, G. J. (2013) The bulk composition of Mars. *Chemie der Erde* **73**, 401-420. doi: 10.1016/j.chemer.2013.09.006