Brian Jackson

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Education

Ph.D. Planetary Sciences U of AZ 2009 May
- Advisor: Prof. Richard Greenberg
- Dissertation Title: "Tidal Evolution of Extra-Solar Planets"

B.S. (Summa cum Laude) Physics Georgia Institute of Technology 2004 May

Positions

Editor-in-Charge, The Planetary Science Journal, AAS Journals	2026 - Present
Director, Central Idaho Dark Sky Reserve STEM Network	
Professor, Boise State Physics	2024 - Present
External Affiliate, SETI Institute	2023 - Present
AAS, Division of Planetary Sciences Executive Committee Member	2021 - 2024
Scientific Editor, American Astronomical Society Journals	2020 - Present
Associate Prof., Boise State Physics	2019 - 2024
NASA Mars Program Office, Mars Concurrent Exploration SAG	2022
Assistant Prof., Boise State Physics	2014 - 2019
Carnegie DTM Astronomy Postdoctoral Fellow	2011-2014
Instructor, U of MD Astronomy Dept.	2010
NASA internship mentor/geology field trip leader	2010, 2011
NASA Postdoctoral Program Fellow, NASA's Goddard	2009-2011
NASA Earth and Space Sciences Graduate Fellow (NESSF), U of AZ	2008-2009
Graduate Research Associate, U of AZ	2004-2008
Georgia Space Grant Fellow, Jet Propulsion Lab	2004
Caltech Summer Undergraduate Research Fellow, Jet Propulsion Lab	2003

Funding (Total: $4.3M)

Idaho Network for Space Exploration Donation 2026
- Total Budget: $5k

Astro Adventure Summer Camp Donation 2026
- Total Budget: $30k

Student Conference Attendance Donation 2026
- Total Budget: $10k

Whittenberger Foundation 2026
`https://whittenberger.org/`
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $5k

Boise State TRANSFORM 2025-2026
https://www.boisestate.edu/transform/
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $7k

Idaho Space Grant Consortium 2026
https://www.idahospacegrant.org/
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $10k

AmeriCorps Palouse-Clearwater Environmental Institute 2026
https://www.pcei.org/our-members
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $22k

NASA Science Activation Program 2022-2026
https://science.nasa.gov/learners
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $1.83M

AmeriCorps Palouse-Clearwater Environmental Institute 2025-2026
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Courtney Warner (courtneywarner@pceiamericorps.org)
- Total Budget: $22k

Boise State Planetarium, Private Fund-Raising Campaign 2024-2025
- Total Budget: $120k

"IDAstro: Astronomical Research and Scholarship in the Gem State", NSF PAARE 2024-2026
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Hans Krimm (hkrimm@nsf.gov)
- Total Budget: $459k

AmeriCorps Palouse-Clearwater Environmental Institute 2024-2025
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Courtney Warner (courtneywarner@pceiamericorps.org)
- Total Budget: $22k

"Doomed Worlds: Mapping Out the Best Extrasolar Systems for Detecting Tidal Decay", NASA FINESST Graduate Fellowship 2024-2026
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: HQ-FINESST@mail.nasa.gov
- Total Budget: $137k

"Doomed Worlds", NASA Idaho Space Grant Consortium Graduate Fellowship 2024-2025
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Susie Johnson (susiej@uidaho.edu)
- Total Budget: $44k

"Transit Archive Project", NASA Exoplanets Research Program 2025-2026
- Proposal PI: Elisabeth Adams, Planetary Science Institute

- Co-I: Brian Jackson, Boise State University
- Program Point-of-Contact: hq-xrp@mail.nasa.gov
- Jackson's portion: $51k

"Devils in the Desert", Idaho Space Grant Consortium 2024
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $1.9k

"Exploring Martian Boundary Layer Processes", NASA Mars Data Analysis Program 2023-2025
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Mitch Schulte
- Total Budget: $366k

"Confirming Ultra-Hot Jupiters from TESS", NASA TESS Guest Investigator Cycle 5 2022-2023
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Hannah Jang-Condell
- Total Budget: $69k

"In-Situ Surface-Atmosphere Interactions" Workshop, NASA TWSC 2022-2023
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Delia Santiago-Materese, delia.santiago-materese@nasa.gov
- Total Budget: $52k

"Finding the Next Doomed Worlds", NASA's XRP 2022-2025
- Proposal PI: Elisabeth Adams, Planetary Science Institute
- Proposal Co-I: Brian Jackson, Boise State University
- Program Point-of-Contact: Hannah Jang-Condell
- Total Budget: $705,335 (Jackson's portion – $190,224)

Boise State Planetarium, Idaho STEM Action Center Spring 2020
`https://stem.idaho.gov/apply/p3/`
- Proposal PI: Brian Jackson, Boise State University
- Total Budget: $7.5k

Boise State Planetarium, Private Fund-Raising Campaign Fall 2019-Spring 2020
- Total Budget: $12.5k

Boise State Planetarium, Boise State Pony Up Crowd-Funding Campaign Fall 2018
`https://ponyup.boisestate.edu/planetarium`
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Cara Walker, carawalker@boisestate.edu
- Total Budget: $5.9k

"Dust Devil Survey Using an Instrumented UAV", NASA Idaho Space Grant Consortium Fall 2018-Spring 2021
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Susie Johnson, susiej@uidaho.edu
- Total Budget: $24,358

"Capturing Devils in the Desert", NASA Solar System Workings 2018-2023
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Jennifer Heldmann, hq-ssw@mail.nasa.gov

- Total Budget: $217,286

Eclipse Outreach, Idaho STEM Action Center 2017
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Angela Hemingway, Angela.Hemingway@stem.idaho.gov
- Total Budget: $6,376

"2017 Idaho Eclipse", Boise State Pony Up Crowd-Funding Campaign Spring 2017
https://ponyup.boisestate.edu/project/5060
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Cara Walker, carawalker@boisestate.edu
- Total Budget: $10,798

"Dust Devil Survey Using an Instrumented UAV", NASA Idaho Space Grant Consortium 2017
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Susie Johnson, susiej@uidaho.edu
- Total Budget: $7,000

Exoclipse Conference, Caltech IPAC 2017
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Dawn Gelino, dawn@ipac.caltech.edu
- Total Budget: $20,000

"Unstable Roche-Lobe Overflow of Gaseous Planets", NASA's XRP 2017-2020
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Christina Richey, christina.r.richey@NASA.gov
- Total Budget: $165,864

"Bring Back Our Observatory", Boise State Pony Up Crowd-Funding Campaign Fall 2015
http://ponyup.boisestate.edu/observatory
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Cara Walker, carawalker@boisestate.edu
- Total Budget: $10,000

"Fossil Cores in the *Kepler* Data", NASA's Astrophys. Data Anal. Program 2014-2018
- Proposal PI: Brian Jackson, Boise State University
- Program Point-of-Contact: Doug Hudgins, Douglas.M.Hudgins@nasa.gov
- Total Budget: $271,200

Professional Service Projects and Awards

Boise State Postdoctoral Mentoring Program Fall 2026
Swiss National Science Foundation Summer 2026
Boise State Graduate Mentoring & Advising Council Working Group Fall 2024-Spring 2025
"Exoplanet Systems and Stellar Life Cycles" Aspen Center for Physics, SOC 2022 - 2023
Division of Planetary Sciences 2024 Annual Meeting, LOC Chair 2023 - 2024
Organizer, "UAS @ BSU" Workshop at Boise State 2023 Apr 6
Mars Concurrent Exploration Science Analysis Group member (MCE-SAG) 2022 Jun - 2023 Mar
Organizer, "In-Situ Surface-Atmosphere Interactions" Workshop at Boise State Summer 2022

NASA Astrophysics Medium Explorer/Explorer Missions of Opportunity Panelist 2022
Boise State, University Foundations Teaching Award 2021
AAS-DPS Executive Committee Member 2021-Present
AAS Journals Science Editor 2020-Present
Division of Planetary Sciences, Local Organizing Committee Member 2020
Thesis Committee Member for Bryan Rosenblatt (MS), BSU, Geosciences 2020-2021
Thesis Committee Member for Steven Kreyche (PhD), U of ID, Physics 2019-2022
NASA Discovery Mission Program ($500M budget) panelist 2019
Boise State Physics Faculty Search Committee Member Fall 2019-Spring 2020
Division of Planetary Sciences Education Sub-Committee Chair 2024-2025
Division of Planetary Sciences Education Sub-Committee Deputy Chair 2019-2024
Division of Planetary Sciences Education Sub-Committee Member 2015-2025
Division of Planetary Sciences-European Planetary Science Conference 2019, Scientific Organizing Committee Member 2018-2019
Division of Planetary Sciences Prize Sub-Committee Member 2017-2019
Division of Planetary Sciences 2018 Meeting, Scientific Organizing Committee Member
Thesis Committee Member for Johnathan Ahlers (PhD), U of ID, Physics Fall 2018
- Thesis title: "Spin-Orbit Misalignment of Planets Orbiting High-Mass Stars: Observations and Techniques Using NASAs Kepler Telescope"

Division of Planetary Sciences Meeting, Local Organizing Committee Member 2017
Developed new University Foundations course, UF100 Summer 2018 - Fall 2018
Boise State Teaching Scholars Fellow Fall 2017 - Spring 2018
Thesis Committee Member for Shannon Mackenzie (PhD), U of ID, Physics Fall 2017
- Thesis title: "Complex hydrocarbons in the Saturn system"

Local Organizing Committee Chair, Exoclipse Conference 2017
Co-Chair, Physics Dept. Seminar Series Fall 2014
Panel and External reviewer for NASA ROSES, NSF Astronomy/Astrophysics, Fonds de recherche du Qubec - Nature et technologies
Manuscript Referee for Icarus, Astrophysical Journal, Planetary Science, Astrobiology, Nature, Science, Celestial Mechanics and Dynamical Astronomy, Monthly Notices of the Royal Astronomical Society, Aeolian Research, Earth and Planetary Science Letters, Journal of Atmospheric and Oceanic Technology
Reviewer for *Comparative Climatology of Terrestrial Planets*, UA Press
Journal Club organizer at Carnegie DTM
Library Committee member at Carnegie DTM
Exoplanet and Astrobiology Journal Club founder at NASA Goddard
External Committee Member/Advisor for Nicole Thom (MS), U of ND, Space Sciences 2012
- Thesis title: "Atmospheric Escape and Orbital Evolution of Exoplanets"

Public Outreach and Education

STEM Teacher Space Science Summer 2023 Workshop 2022 - 2023
NASA-Supported Central Idaho Dark Sky Reserve STEM Network 2022 - Present
Boise State Physics First Friday Astronomy Public Events Summer 2016 - Present
Boise State Physics Third Thursday Virtual Planetarium Shows Spring 2021 - Fall 2022

STEM Teacher Space Science Summer 2019 Workshop 2018-2019
Pony Up Crowd-Funding campaign ($11k) for regional solar eclipse outreach Spring 2017
https://ponyup.boisestate.edu/project/5060
Pony Up Crowd-Funding campaign ($10k) to refurbish on-Campus observatory Fall 2015
https://ponyup.boisestate.edu/observatory
Organized $16k+ of private telescope equipment to Boise State
Panelist for discussion of science and theater in "Cosmic Conversations" 2016 Feb
American Assoc. of Physics Teachers New Faculty Workshop, College Park MD 2015 Jun
Invited Author for "Physics World" – https://tinyurl.com/y8un6tml 2015
Board Member for Montgomery County MD Science Fair 2013
Judge for Montgomery County MD Science Fair 2012, 2013
Participant in several science documentaries 2011 Aug
Astronomy partner with Towson U.'s Project ASTRO 2011-2012
Astronomy partner with U of AZ Project ASTRO 2005-2006
Regular contributor to "Astronomy" Magazine's "Ask Astro"
Professional NASA media training

Advisees

Bradley Fick (BSU Computing PhD) – Transit-Timing of Exoplanets 2026 - Present
Rachel Clark (BSU Physics) – Martian Boundary Layer Processes 2026 - Present
Dr. Aylin Garcia Soto (BSU Physics Postdoc) 2026 Mar - Present
Dr. Racine Cleveland (BSU Physics Postdoc) 2026 Mar - Present
Anna Humphrey (BSU Physics) – Observations of Transiting Exoplanets 2025 - Present
Jacob Denney (BSU Physics) – Observations of Transiting Exoplanets 2025 - 2026
Bradley Fick (BSU Physics) – Observations of Transiting Exoplanets 2025 - 2026
Braydon Dietrich (BSU Physics) – Microphone anemometry 2025
Killian Richardson (BSU Physics) – Observations of Transiting Exoplanets 2025
Chelle Szurgot (BSU Geosciences PhD) – Martian Boundary Layer Processes 2024 - 2025
Joshua Gambill (BSU Physics) – Martian Boundary Layer Processes 2024 - 2025
Adrienne Kirk (BSU Physics) – Observations of Transiting Exoplanets 2024 - 2025
Malia Barker (BSU Computing PhD) – Observations of Transiting Exoplanets 2023 - 2025
Dr. Rachel Huchmala (BSU Physics Postdoc) – Observations of Transiting Exoplanets 2023 - 2025
Dallon Carlson (BSU Physics) – Observations of Transiting Exoplanets 2023 - 2025
Hailey Stubbers (BSU Physics) – Observations of Transiting Exoplanets 2022 - Spring 2023
Justin Crevier (BSU Physics) – Terrestrial & Martian Dust Devils 2019 - Spring 2023
Bourgeois Gadjagboui (BSU Computing PhD) – Phase Curves of Exoplanets 2021 - 2022
Hallie Dodge (BSU Physics) – Terrestrial & Martian Dust Devils 2021 - 2022
Prasanna Jayanthi (BSU Physics) – Transit Photometry 2018 - 2022
Ciera Partyka-Worley (BSU Physics) – Short-Period Exoplanets 2018 - 2020
Sevio Stanton (C. of W. ID) – Short-Period Exoplanets 2019 - 2020
Chelle Szurgot (BSU Physics) – Terrestrial & Martian Dust Devils 2018 - 2021
Samantha Johnson (BSU Physics) – Short-Period Exoplanets 2017 - 2019
Went on to UNC Chapel Hill as physics grad

Wesley Sandidge (BSU Physics) – Eclipse Variability 2016 - 2018
Went on to work for City of Boise
Simon Roy (BSU Physics) – Unstable Roche-Lobe Overflow 2016 - 2017
Steven Kreyche (BSU Physics) – Eclipse Variability 2016 - 2017
Went on to U of ID as physics grad
Karan Davis (BSU Physics) – Terrestrial & Martian Dust Devils 2016 - 2018
Went on to Puget Sound Power
Jennifer Briggs (BSU Physics) – Eclipse Variability as Observed by the Kepler Mission 2015
Jacob Sabin (BSU Physics) – Adapting the Titius-Bode Law to Exoplanet Systems 2015
Elizabeth Kandziolka (BSU Physics) – Eclipse Variability 2015
Nathan Grigsby (BSU Physics) – Terrestrial & Martian Dust Devils 2015
Emily Jensen (BSU Physics) – Stable Roche-Lobe Overflow 2014 - 2016
Went on to U of WY as astronomy grad
Ben Knipping (BSU Physics) – Short-Period Exoplanets from the Kepler Mission 2014 - 2015
David Weiss (College of Charleston) – Terrestrial & Martian Basalt Column Morphology 2011
Went on to Brown as geology grad
Nicole Thom (U of ND) – Evaporative Mass Loss from Short-Period Exoplanets 2010
Went on to Harvard CfA as software developer
Kynan Rilee (Princeton) 2010

Professional Training

Code/Astro participant – https://semaphorep.github.io/codeastro/ Summer 2021
Certified Software Carpentry Instructor – https://software-carpentry.org/ Summer 2018
Boise State Teaching Scholars Program –
Boise State's Center for Teaching and Learning Fall 2017-Spring 2018
Creating Rubrics: Multi-purpose tools for you and your students –
Boise State's Center for Teaching and Learning Spring 2016
Undergraduate Research as a High Impact Learning Experience Inside the Classroom –
Boise State's Center for Teaching and Learning Spring 2016
Faculty Writing Circle – Boise State's Center for Teaching and Learning Fall 2015-Spring 2016
Using Active Learning Techniques for Teaching and Assessment Workshop –
Boise State's Center for Teaching and Learning Fall 2015
New Faculty Workshop – American Association of Physics Teachers Summer 2015
Service-Learning Orientation – Boise State's Center for Teaching and Learning Fall 2014

Publications – h-index: 34, total ref. pubs: 62, total citations: 4000+ (Student/Postdoc authors).

Articles

L. K. Fenton, S. P. Scheidt, G. Arzaga, K. Marek, S. Metzger, T. I. Michaels, T. C. Dorn, R. Battin, B. Cole, J. Crevier, & et al. Variations in Dust Devil Characteristics Across Spatially Varying Terrain: Results from a Field Study in Smith Creek Valley, Nevada, USA. *Geosciences*, 16(7):262, 2026.

B. JACKSON, E. R. Adams, R.M. Huchmala, M. Barker, M. Rothmeier, J. P. Morgenthaler, & A. A. Sickafoose. Metrics for Optimizing Searches for Orbital Precession and Tidal Decay via Transit Timing and Occultation Timing. AJ, 171(2):103, 2026.

S. J. Conway, V. T. Bickel, L. K. Fenton, M. R. Patel, H. C. Carson, A. Blouin, J. Crevier, E. Blanc, B. N. Nguyen, J. A. Holmes, **B. Jackson**, & L. Roelofs. A global survey for dust devil vortices on mars using MRO context camera images enabled by neural networks. Planet. Space Sci., 259:106072, 2025.

B. Jackson, L. Fenton, T. Brown, A. Munguira, G. Martinez, C. Newman, D. Viúdez-Moreiras, M. Golombek, R. Lorenz, M. D. Paton, & D. Conway. Profiling Near-surface Winds on Mars Using Attitude Data from Mars 2020 Ingenuity. PSJ, 6(1):21, 2025a.

B. Jackson, L. Fenton, R. Lorenz, C. Szurgot, J. Gambill, & G. Arzaga. On Dust Devil Diameters, Occurrence Rates, and Activity. PSJ, 6(8):193, 2025b.

B. Jackson, Y. Nakamura, & H. Nakagawa. Stereo-imaging of Martian Dust Plumes by Multiple Coordinated Spacecraft. *Research Notes of the American Astronomical Society*, 9(7):155, 2025c.

M. Rothmeier, E. R. Adams, K. Schindler, A. Beck, **B. Jackson**, J. P. Morgenthaler, A. A. Sickafoose, M. Barker, L. Mancini, J. Southworth, D. Evans, & A. Krabbe. Doomed Worlds. II. Reassessing Suggestions of Orbital Decay for TrES-5 b. PSJ, 6(12):292, 2025.

E. R. Adams, **B. Jackson**, A. A. Sickafoose, J. P. Morgenthaler, H. Worters, H. Stubbers, D. Carlson, S. Bhure, S. Dekeyser, C. X. Huang, & N. N. Weinberg. Doomed Worlds. I. No New Evidence for Orbital Decay in a Long-term Survey of 43 Ultrahot Jupiters. PSJ, 5(7):163, 2024.

S. B. Howell, D. A. Howell, R. A. Street, M. Soares-Furtado, **B. Jackson**, & T. P. Greene. The dynamic universe: realizing the potential of classical time domain and multimessenger astrophysics. *Frontiers in Astronomy and Space Sciences*, 11:1304616, 2024.

M. Soares-Furtado, M. A. Limbach, A. Vanderburg, J. Bally, J. Becker, A. L. Rosen, L. G. Bouma, J. M. Vos, S. B. Howell, T. G. Beatty, W. M. J. Best, A. M. Cody, A. Distler, E. D'Onghia, R. Heller, B. S. Hensley, N. R. Hinkel, **B. Jackson**, M. Kounkel, A. Kraus, A. W. Mann, N. T. Marston, M. Robberto, J. E. Rodriguez, J. H. Steffen, J. K. Teske, R. Townsend, R. Yarza, & A. Youngblood. The TEMPO Survey II: Science Cases Leveraged from a Proposed 30-Day Time Domain Survey of the Orion Nebula with the Nancy Grace Roman Space Telescope. *arXiv e-prints*, arXiv:2406.01492, 2024.

B. Jackson, E. R. Adams, & J. P. Morgenthaler. Metrics for Optimizing Searches for Tidally Decaying Exoplanets. AJ, 166(4):142, 2023.

B. Jackson. Vortices and Dust Devils as Observed by the Mars Environmental Dynamics Analyzer Instruments on Board the Mars 2020 Perseverance Rover. PSJ, 3(1):20, 2022a.

B. Jackson. Estimating Aerodynamic Properties of Planetary Surfaces using Drone Attitude. *Research Notes of the American Astronomical Society*, 6(12):264, 2022b.

B. Jackson. Estimating the heights of martian vortices from mars 2020 MEDA data. PSJ, 3(8):203, 2022.

E. R. Adams, **B. Jackson**, S. R. Johnson, D. R. Ciardi, W. D. Cochran, M. Endl, M. E. Everett, E. Furlan, S. B. Howell, P. Jayanthi, P. J. MacQueen, R. A. Matson, C. Partyka-Worley, J. Schlieder, N. J. Scott, S. M. Stanton, & C. Ziegler. Ultra-short-period Planets in K2. III. Neighbors are Common with 13 New Multiplanet Systems and 10 Newly Validated Planets in Campaigns 0-8 and 10. PSJ, 2(4):152, 2021.

B. Jackson, J. Crevier, M. Szurgot, R. Battin, C. Perrin, & S. Rodriguez. Inferring Vortex and Dust Devil Statistics from InSight. *The Planetary Science Journal*, 2(5):206, 2021.

A. Omran, C. Oze, **B. Jackson**, C. Mehta, L. M. Barge, J. Bada, & M. A. Pasek. Phosphine Generation Pathways on Rocky Planets. *Astrobiology*, 21(10):1264–1276, 2021.

B. Jackson. On the relationship between dust devil radii and heights. *Icarus*, 338:113523, 2020.

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B. JACKSON, R. D. Lorenz, J. W. Barnes, & M. Szurgot. Dust Devils on Titan. *Journal of Geophysical Research (Planets)*, 125(3):e06238, 2020.

B. JACKSON, E. Adams, W. Sandidge, S. Kreyche, & J. Briggs. Variability in the Atmosphere of the Hot Jupiter Kepler-76b. AJ, 157(6):239, 2019.

J. W. Barnes, S. M. MacKenzie, E. F. Young, L. E. Trouille, S. Rodriguez, T. Cornet, **B. JACKSON**, M. Ádámkovics, C. Sotin, & J. M. Soderblom. Spherical radiative transfer in c++ (srtc++): A parallel monte carlo radiative transfer model for titan. *The Astronomical Journal*, 155(6):264, 2018.

B. JACKSON, R. Lorenz, & Davis, K. A framework for relating the structures and recovery statistics in pressure time-series surveys for dust devils. *Icarus*, 299:166–174, 2018a.

B. JACKSON, R. Lorenz, Davis, K., & B. Lipple. Using an instrumented drone to probe dust devils on oregons alvord desert. *Remote Sensing*, 10(1):65, 2018b.

R. D. Lorenz, **B. JACKSON**, & P. D. Lanagan. A timelapse camera dataset and markov model of dust devil activity at eldorado playa, nevada, usa. *Aeolian Research*, 33:33–43, 2018.

E. R. Adams, **B. JACKSON**, M. Endl, W. D. Cochran, P. J. MacQueen, D. A. Duev, R. Jensen-Clem, M. Salama, C. Ziegler, C. Baranec et al. Ultra-short-period planets in k2 with companions: A double transiting system for epic 220674823. *The Astronomical Journal*, 153(2):82, 2017.

B. JACKSON, P. Arras, K. Penev, S. Peacock, & P. Marchant. A new model of roche lobe overflow for short-period gaseous planets and binary stars. *The Astrophysical Journal*, 835(2):145, 2017a.

B. JACKSON, Jensen, E., S. Peacock, P. Arras, & K. Penev. Erratum to: Tidal decay and stable roche-lobe overflow of short-period gaseous exoplanets. *Celestial Mechanics and Dynamical Astronomy*, 129(4):553–554, 2017b.

E. R. Adams, **B. JACKSON**, & M. Endl. Ultra-short-period planets in k2 superpig results for campaigns 0–5. *The Astronomical Journal*, 152(2):47, 2016.

R. Heller, M. Hippke, & **B. JACKSON**. Modeling the orbital sampling effect of extrasolar moons. *The Astrophysical Journal*, 820(2):88, 2016.

B. JACKSON, Jensen, E., S. Peacock, P. Arras, & K. Penev. Tidal decay and stable roche-lobe overflow of short-period gaseous exoplanets. *Celestial Mechanics and Dynamical Astronomy*, 126(1-3):227–248, 2016.

B. JACKSON & R. Lorenz. A multiyear dust devil vortex survey using an automated search of pressure time series. *Journal of Geophysical Research: Planets*, 120(3):401–412, 2015. ISSN 2169-9100. 2014JE004712.

R. D. Lorenz & **B. JACKSON**. Dust devils and dustless vortices on a desert playa observed with surface pressure and solar flux logging. *GeoResJ*, 5:1–11, 2015.

G. Vixie, J. W. Barnes, **B. JACKSON**, S. Rodriguez, S. Le Mouélic, C. Sotin, S. MacKenzie, & P. Wilson. Possible temperate lakes on Titan. Icarus, 257:313–323, 2015.

R. D. Lorenz & **B. JACKSON**. Declining rock movement at Racetrack Playa, Death Valley National Park: An indicator of climate change? *Geomorphology*, 211:116–120, 2014.

R. D. Norris, J. M. Norris, R. D. Lorenz, J. Ray, & **B. JACKSON**. Sliding Rocks on Racetrack Playa, Death Valley National Park: First Observation of Rocks in Motion. *PLOS ONE*, 9:8, 2014.

K. Penev, M. Zhang, & **B. JACKSON**. POET: A Model for Planetary Orbital Evolution Due to Tides on Evolving Stars. PASP, 126:553–564, 2014.

J. W. Barnes, J. C. van Eyken, **B. JACKSON**, D. R. Ciardi, & J. J. Fortney. Measurement of Spin-

orbit Misalignment and Nodal Precession for the Planet around Pre-main-sequence Star PTFO 8-8695 from Gravity Darkening. ApJ, 774:53, 2013.

B. JACKSON, C. C. Stark, E. R. Adams, J. Chambers, & D. Deming. A Survey for Very Short-period Planets in the Kepler Data. ApJ, 779:165, 2013.

C. C. Stark, A. P. Boss, A. J. Weinberger, **B. JACKSON**, M. Endl, W. D. Cochran, M. Johnson, C. Caldwell, E. Agol, E. B. Ford, J. R. Hall, K. A. Ibrahim, & J. Li. A Search for Exozodiacal Clouds with Kepler. ApJ, 764:195, 2013.

D. Deming, J. D. Fraine, P. V. Sada, N. Madhusudhan, H. A. Knutson, J. Harrington, J. Blecic, S. Nymeyer, A. M. S. Smith, & **B. JACKSON**. Infrared Eclipses of the Strongly Irradiated Planet WASP-33b, and Oscillations of Its Host Star. ApJ, 754:106, 2012.

B.-O. Demory, M. Gillon, S. Seager, B. Benneke, D. Deming, & **B. JACKSON**. Detection of Thermal Emission from a Super-Earth. ApJ, 751:L28, 2012.

B. JACKSON, N. K. Lewis, J. W. Barnes, L. Drake Deming, A. P. Showman, & J. J. Fortney. The EVIL-MC Model for Ellipsoidal Variations of Planet-hosting Stars and Applications to the HAT-P-7 System. ApJ, 751:112, 2012.

K. Penev, **B. JACKSON**, F. Spada, & Thom, N. Constraining Tidal Dissipation in Stars from the Destruction Rates of Exoplanets. ApJ, 751:96, 2012.

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Seminars, Colloquia, and Public Lectures

2026 Jul 20: Sagan Summer Workshop, Pasadena CA
2025 Jul 22: Sagan Summer Workshop, Pasadena CA
2022 Jun 13: NASA JPL Science Visitor and Colloquium Program, Pasadena CA
2021 Oct 29: Planetary Aeolian Processes @ Boise State Geosciences Club, Boise ID
2021 Mar 28: Exploring Mars Atmospheric Boundary Layer with the InSight Mission @ Boise State Geosciences Seminar, Boise ID
2020 Feb 22-23: Summoning Devils in the Desert @ Death Valley Dark Sky Festival, Death Valley CA
2019 Sep 6: Dust Devils Throughout the Solar System @ Boise State First Friday Astronomy, Boise ID
2019 Sep 6: Summoning Devils in the Desert @ Boise State Physics, Boise ID
2019 Aug 23: Astronomy Before Galileo @ Sawtooth Historical and Interpretive Assoc., Stanley ID
2019 Aug 6: Summoning Devils in the Desert @ Sunrise Rotary Club, Boise ID
2019 Jun 19: The Weather on Distant Worlds @ Kavli Institute for Theoretical Physics, Santa Barbara CA

2019 Apr 11: The Weather on Distant Worlds @ University of Washington Astronomy, Seattle WA
2019 Mar 8: Astronomy Before Galileo @ Boise Astronomical Society, Boise ID
2019 Mar 8: The Weather on Distant Worlds @ Boise Astronomical Society, Boise ID
2019 Feb 28: Aerospace Day @ Boise State University, Boise ID
2019 Feb 2: Alien Worlds @ Boise State Engineering & Science Festival, Boise ID
2018 Nov 12: Alien Worlds, Alien Life @ Osher Institute, Boise ID
2018 Oct 29: Alien Worlds, Alien Life @ Osher Institute, Boise ID
2018 Aug 2: Nampa Public Library, Nampa IA
2018 Jun 8: Boise Astronomical Society, Boise ID
2018 Jun 1: Northwest American Physical Society Meeting @ University of Puget Sound, Tacoma WA
2018 Apr 4: Physics & Astronomy Colloquium @ University of Texas at Dallas, Dallas TX - Host: Prof. Kaloyan Penev
2018 Jan 9: Thinks and Drinks @ Long Drop Cider, Boise ID
2018 Feb 3: Engineering and Science Festival @ Boise State, Boise ID
2018 Jan 30: Technologies for Exoplanetary Science Seminar @ McGill University - Host: Prof. Nicholas Cowan
2017 Dec 7: Astronomy Colloquium @ Lowell Observatory, Flagstaff AZ - Host: Dr. Joe Llama
2017 Nov 30: Physics & Astronomy Colloquium @ College of Idaho, Caldwell ID
2017 Sep 19: MIT Planetary Lunch Colloquium Series @ MIT, Cambridge MA - Host: John Brooks Biersteker
2017 Sep 25: Geosciences Colloquium @ Boise State, Boise ID - Host: Prof. Jen Pierce
2017 Jul 26: Idaho Conference for Undergraduate Research @ Boise State, Boise ID
2017 Jun 9: Boise Astronomical Society Meeting, Boise ID
2017 Mar 31: Formation and Dynamical Evolution of Exoplanets @ Aspen Center for Physics, Aspen CO
2017 Feb 27: Presentation about the Solar Eclipse @ Flying M, Nampa ID
2017 Feb 16: Teen Science Café @ Boise Public Library, Boise ID
2017 Feb 16: Research Computing Days Lightning Talk @ Boise State, Boise ID
2017 Feb 4: Engineering & Science Festival @ Boise State, Boise ID
2017 Feb 3: Aerospace Day @ Boise State, Boise ID
2017 Jan 27: Geology Colloquium @ University of Wyoming Geology & Geophysics, Laramie WY - Host: Prof. Robert Howell
2017 Jan 27: Astronomy Colloquium @ University of Wyoming Physics & Astronomy, Laramie WY - Host: Prof. Hannah Jang-Condell
2016 Oct 6: Viewing the 2017 Eclipse with Your Class @ Learning Across All Dimensions Teacher Conference, Boise ID
2016 Aug 5: Tidal Decay and Disruption of Gaseous Exoplanets @ Exoclimes 2016 Conference, Quest University, Squamish BC, CA
2016 Apr 7: The Exoplanet Revolution @ Osher Institute, Boise ID
2016 Apr 1: Earth Sciences Colloquium @ University of Western Ontario, London ON, CA - Host: Prof. Catherine Neish, UWO Earth Sciences
2016 Mar 31: Physics and Astronomy Colloquium @ University of Western Ontario, London ON, CA - Host: Prof. Peter Brown, UWO Physics and Astronomy

2016 Mar 31: Centre for Planetary Science and Exploration (CPSX) Brown-Bag Talk @ University of Western Ontario, London ON, CA - Host: Prof. Catherine Neish, UWO Earth Sciences
2016 Feb 5: Keynote Speaker for Aerospace Day @ Boise State University, Boise ID - Host: Christine Chang Gillespie, Boise State Instfor STEM and Diversity Initiatives
2016 Jan 25: Physics Dept. Colloquium @ Idaho State University, Pocatello ID - Host: Prof. Steven Shropshire
2015 Dec 4: Astronomy Dept. Colloquium @ New Mexico State University, Las Cruces NM - Host: Prof. Jim Murphy
2015 Sep 24: Geosciences Dept. Seminar @ Brigham Young University, Provo UT - Host: Prof. Jani Radebaugh
2015 Sep 23: Physics & Astronomy Dept. Seminar @ Brigham Young University, Provo UT - Host: Prof. Clark Christensen
2015 Sep 4: Physics Dept. Seminar @ Boise State University, Boise ID - Host: Prof. Charles Hanna
2015 Jun 26: Planetary Astronomy Lunch Seminar@ University of Maryland, College Park MD - Host: Dr. Michael Kelley
2014 Oct 27: Geosciences Department Seminar @ Boise State University, Boise ID Host: Prof. David Wilkins
2014 Apr 17: Monthly Meeting Lecture @ Howard Astronomical League, Howard Co., MD Host: Chris Todd
2014 Mar 4: Departmental Seminar @ Boise State Univ., Boise ID Host: Prof. Daryl Macomb
2014 Feb 27: Departmental Seminar @ U of NE, Kearney, Kearney NE Host: Prof. W. Lee Powell
2014 Feb 4: Planetary Astronomy Lunch Seminar (PALS) @ U of MD, College Park MD Host: Dr. Michael Kelley
2013 Dec 19: Department Seminar @ Carnegie DTM, Washington DC – Host: Dr. Alycia Weinberger
2013 Dec 19: Department Seminar @ Carnegie DTM, Washington DC – Host: Dr. Alycia Weinberger
2013 Dec 11: Astronomy Colloquium @ US Naval Observatory, Washington DC – Host: Dr. Mark Stollberg
2013 Sep 24: Exoplanets Seminar @ NASA Goddard, Greenbelt MD – Host: Dr. Marc Kuchner
2013 Sep 12: Dept. of Astronomy TUNA Talk @ University of Virginia, Charlottesville VA – Host: Prof. Phil Arras
2013 Mar 21: Adler Planetarium Invited Seminar, Chicago IL – Host: Dr. Geza Gyuk
2013 Feb 13: Physics and Space Sciences Dept. Colloquium @ Florida Institute of Technology, Melbourne FL – Host: Prof. Terry Oswalt
2012 Nov 20: NASA's Goddard Exoplanets Seminar @ NASA/GSFC, Greenbelt MD – Host: Dr. Marc Kuchner
2012 Nov 14: University of Maryland Astronomy Dept. Colloquium @ University of Maryland, College Park MD – Host: Prof. Richard Mushotzky
2012 Oct 31: Carnegie DTM Colloquium @ Carnegie DTM, Washington DC – Host: Dr. Matt Fouch
2012 Oct 8: Special Talk @ Space Telescope Science Institute (STScI), Baltimore MD – Host: Dr. Anand Sivaramakrishan

2012 Apr 27: Geology Dept. Colloquium @ University of South Florida, Tampa FL - Host: Prof. Matthew Pasek
2012 Mar 1: Astronomy Dept. Lunch Talk @ Vanderbilt University, Nashville TN - Host: Dr. Joshua Pepper
2012 Feb 8: Physics Dept. Colloquium @ Lehigh University, Bethlehem PA - Host: Prof. George McCluskey
2011 Nov 3: Astronomy Dept. Colloquium @ Univ. of Virginia, Charlottesville VA – Host: Prof. Phil Arras
2011 Jun 7: Heraeus Seminar, Physikzentrum Bad Honnef, Germany (invited)
2011 May 12: Physics and Astronomy Dept. Colloquium @ Georgia State Univ., Atlanta GA - Host: Prof. Michael Crenshaw
2011 Feb 1: National Capital Astronomers monthly meeting (invited)
2010 May 7: Physics Dept. Colloquium @ Univ. of Idaho, Moscow ID - Host: Prof. Jason Barnes
2010 Apr 24: Northern Virginia Astronomy Clubs Astronomy Day (invited)
2010 Mar 21: Science and Exploration Director's Science Seminar @ NASA/GSFC, Greenbelt MD - Host: Joseph Nuth
2010 Mar 17: Wednesday Lunch Talk (Wunch) @ Princeton Astrophysics Dept., Princeton NJ - Hosts: Tim Brandt and Prof. Adam Burrows
2010 Feb 23: Institute for Theoretical Computation Lunch Talk @ Harvard CfA, Boston MA - Host: Dr. Darin Ragozzine
2010 Feb 19: Special Planetary Science Seminar @ MIT Earth, Atmospheric, and Planetary Sciences Dept., Boston MA - Host: Prof. Sara Seager
2010 Feb 2: Kleigel Planetary Science Seminar @ Caltech Geological and Planetary Sciences Dept., Pasadena CA - Host: Prof. Michael Brown
2010 Jan 13: Science Brown-Bag Seminar @ NASA Headquarters, Washington D.C. - Host: Joe Bredekamp
2009 Nov 19: Physics and Astronomy Dept. Colloquium @ Franklin and Marshall College, Lancaster PA – Host: Dr. Delphine Perrodin
2009 Oct 29: Physics and Astronomy Dept. Colloquium @ State Univ. of New York Stony Brook, Stony Brook NY – Host: Prof. Deane Peterson
2009 Oct 27: Astronomy and Astrophysics Dept. Pizza Lunch Seminar @ Columbia Univ., New York NY – Host: Prof. Kristen Menou
2009 Sep 17: Exoplanets Group Talk @ Goddard Space Flight Center, Greenbelt MD - Host: Dr. Marc Kuchner
2009 Jul 21: Astronomy Dept. Colloquium @ Univ. of Washington, Seattle WA - Host: Dr. Rory Barnes
2009 Jun 5: Astronomy Dept. Colloquium @ Univ. of California Santa Cruz, Santa Cruz CA - Host: Prof. Jonathan Fortney

Courses Taught

Spring 2026

- PHYS 341 - Classical Mechanics – Syllabus
- PHYS 105 - Stars and Cosmology lab

Fall 2025

- PHYS 305 - Introduction to Astrophysics and Astronomical Observing – Syllabus
- PHYS 405 - Astrophysics – Syllabus

Spring 2025

- PHYS 305 - Introduction to Astrophysics and Astronomical Observing – Syllabus
- PHYS 105 - Stars and Cosmology lab

Fall 2024

- UF 100 - Alien Worlds, Alien Life - Syllabus
- VIP 200/500 - Across the Universe - Syllabus

Spring 2024

- PHYS 305 - Introduction to Astrophysics and Astronomical Observing – Syllabus
- PHYS 105 - Stars and Cosmology lab

Fall 2023

- UF 100 - Alien Worlds, Alien Life - Syllabus

Spring 2023

- PHYS 305 - Introduction to Astrophysics and Astronomical Observing – Syllabus
- PHYS 105 - Stars and Cosmology lab

Fall 2022

- UF 100 - Alien Worlds, Alien Life - Syllabus

Spring 2021

- PHYS 341 - Mechanics
  https://sites.google.com/view/bsu2021phys341/
- PHYS 205 - Stellar Astronomy

Fall 2020

- UF 100 - Alien Worlds, Alien Life - Syllabus

Spring 2020

- PHYS 341 - Mechanics
  https://sites.google.com/view/bsu2020phys341/
- PHYS 205 - Stellar Astronomy

Fall 2019

- UF 100 - Alien Worlds, Alien Life - Syllabus

Spring 2019

- PHYS 341 - Mechanics
  https://sites.google.com/view/bsu2019phys341/
- PHYS 205 - Stellar Astronomy

Fall 2018

- UF 100 - Alien Worlds, Alien Life - Syllabus

Spring 2018

- PHYS 341 - Mechanics
  https://sites.google.com/site/bsu2018phys341/
- PHYS 205 - Stellar Astronomy

Fall 2017

- PHYS 104 - Planets and Astrobiology
- PHYS 204 - Planetary Astronomy

Spring 2017

- PHYS 341 - Mechanics
  https://sites.google.com/site/bsu2017phys341/
- PHYS 205 - Stellar Astronomy

Fall 2016

- PHYS 104 - Planets and Astrobiology - Syllabus
- PHYS 204 - Planetary Astronomy
  https://sites.google.com/site/bsu2016phys205wiki/

Spring 2016

- PHYS 341 - Mechanics
  https://sites.google.com/site/bsu2016phys341/
- PHYS 205 - Stellar Astronomy
  https://sites.google.com/site/bsu2016phys205wiki/

Fall 2015

- PHYS 104/204 - Planets and Astrobiology
  https://sites.google.com/site/bsu2015phys104/
  https://sites.google.com/site/bsu2015phys204wiki/

Spring 2015

- PHYS 341 - Mechanics
  https://sites.google.com/site/bsu2015phys341/

Fall 2014

- PHYS 405 - Astrophysics
  https://sites.google.com/site/bsu2014phys405/

Spring 2010

- ASTR 330 Solar System Astronomy (University of Maryland)