Dr Benjamin Pope

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Current Position

Associate Professor of Statistical Data Science   *Feb 2025-Present*

SCHOOL OF MATHEMATICAL & PHYSICAL SCIENCES, MACQUARIE UNIVERSITY   *Sydney, NSW, Australia*

- Leading Astrostatistics Research Group
- ARC DP26

Experience

Senior Lecturer in Astrophysics & ARC DECRA Fellow   *2021-2024*

SCHOOL OF MATHEMATICS & PHYSICS, UNIVERSITY OF QUEENSLAND   *Brisbane, Queensland, Australia*

- ARC Discovery Early Career Researcher Award (DECRA Fellowship) and ARC Discovery Project 2023
- Lecturer 2021-2023, Senior Lecturer 2024
- Big Questions Institute Fellowship
- Queensland Tall Poppy Award for Science

NASA Sagan Postdoctoral Fellow   *November 2017 - October 2020*

CENTER FOR DATA SCIENCE & CENTER FOR COSMOLOGY AND PARTICLE PHYSICS, NEW YORK UNIVERSITY   *New York, NY*

- Visiting Researcher at the Simons Foundation's Flatiron Institute Center for Computational Astrophysics.
- Awarded USD $100,000 in competitive research grants to use the NASA TESS Space Telescope.
- Lectured on statistical and machine learning methods to NYU Masters in Data Science students.

Breakthrough Foundation Postdoctoral Research Associate   *June-November 2017*

UNIVERSITY OF SYDNEY   *Sydney, NSW*

- Contributed to the optical design of the TOLIMAN Space Telescope.
- Lectured in the Physics Honours course on Bayesian methods and machine learning.

Education

Doctor of Philosophy (DPhil) in Astrophysics   *October 2013 - May 2017*

BALLIOL COLLEGE, UNIVERSITY OF OXFORD   *Oxford, England*

- Thesis: *Observing Bright Stars and their Planets from Earth and from Space*
- Clarendon Scholarship and Jowett Scholarship.

Master of Science (MSc)   *2013*

UNIVERSITY OF SYDNEY   *Sydney, NSW, Australia*

- Vice-Chancellor's Research Award.

Bachelor of Science (First Class Honours with the University Medal)   *2009-2012*

UNIVERSITY OF SYDNEY   *Sydney, NSW, Australia*

- University Medal, Dean's Honours List, University prizes for best physics and astrophysics thesis, and national Bok Prize for best astrophysics honours thesis.
- Studied abroad at the University of California, Berkeley (2010-11) and Nanjing University, China (2011).

Study Abroad   *2010-11*

UNIVERSITY OF CALIFORNIA, BERKELEY   *Berkeley, California, USA*

- Undergraduate research project with Nobel Laureate and inventor of the laser, Prof. Charles H. Townes.

Research

Publications
Led 13 refereed publications; co-author of 53, with 1904 citations; h-index: 23. (Full list).
Published in *Proceedings of the Royal Society A*, *Nature Astronomy*, *The Astrophysical Journal*,
Monthly Notices of the Royal Astronomical Society, *Astronomy & Astrophysics*, and other journals.

Presentations
Presented as an invited speaker at Harvard, MIT, Yale, Columbia, University of Washington,
Johns Hopkins, Carnegie Mellon, Cambridge, Oxford, Leiden, Groningen, the Royal Astronomical Society,
Universities of Sydney, Melbourne, UNSW, Swinburne, Monash, Melbourne.

Peer Review
Refereed papers for the *Journal of Open Source Software*; all main astronomy journals *ApJ*, *MNRAS*,
A&A and all their Letters sections; and optics journal *JOSA*; and reviewed telescope proposals,
fellowships, and other grants for the ARC, NASA, STFC, NSF.

Open Source
All publications are available on arXiv, with source code on GitHub. Examples of main packages:
`halophot`, code for enhancing the dynamic range of *Kepler* and TESS space telescopes (with Tim White),
`dLux`, a differentiable Jax simulation package for physical optics (with student Louis Desdoigts) and
`ticktack`, the first open-source package for Bayesian modelling of radiocarbon data (with students Qingyuan
Zhang & Utkarsh Sharma)

ARC Grants
Led successful ARC DP26 ($592,045.00) DP23 ($390,000), DE21 ($444,075) grants, and CI on LP21 ($885,000),
LE22 ($296,339).

Public Communication

University Challenge
Member of the winning team for Balliol College, Oxford on the 2016-17 season of the BBC's most
popular quiz show, *University Challenge*.

Science Writing
Science journalism published in *The Monthly* magazine, *Cooper Square Review*, and *Oxonian Review*.
Completed Introductory and Advanced Science Communication courses at NYU Journalism School.
Included in *Best Australian Science Writing 2021* and *You are Not Expected to Understand This:
How 26 Lines of Code Changed the World*.

Consulting
Scientific consultant for *War of the Worlds*, the 2019 Fox/Studio Canal TV series.

Presentation
Sold-out performances for Pint of Science, World Science Festival at QPAC, Caveat NYC, and
Astronomy on Tap Brooklyn. Interviewed on ABC News Radio & TV, quoted in the *Guardian*,
Sydney Morning Herald, and *New York Times*.

Outreach
Lead organizer of public telescope viewings of eclipses and the Transits of Venus and Mercury
in Sydney, New York, Oxford, and Brisbane. Telescope guide at Uluru, Stargazing Oxford, and
PopScope DC and Baltimore.

Benjamin Pope - Publications

85. Huang, Titov, Schmidt, **Pope**, Brennen, Oi, and Kok. *Quantum-enabled optical large-baseline interferometry: applications, protocols and feasibility. Advances in Physics X*, vol. 11, pp. 97311 (2026).

84. Koo, Stefansson, Kavanagh, Delamer, Mahadevan, Callingham, Vedantham, Robertson, Bruijne, Bender, Cañas, Diddams, Espinoza-Retamal, Fernandes, Halverson, Kanodia, Krolikowski, Lin, **Pope**, Roy, Schwab, Terrien, and Wright. *Spectroscopic characterization of LOFAR radio-emitting M dwarfs. Astronomy and Astrophysics*, vol. 706, pp. A98 (2026).

83. McDougall, Davis, Yu, Martini, Lidman, Malik, Penton, Lewis, Tucker, **Pope**, et al. *OzDES Reverberation Mapping of Active Galactic Nuclei: Final Data Release, Black-Hole Mass Results, & Scaling Relations. arXiv e-prints*, vol. pp. arXiv:2512.01261 (2025).

82. White, **Pope**, Tuthill, Han, Dholakia, Lau, Callingham, and Richardson. *The Serpent Eating Its Own Tail: Dust Destruction in the Apep Colliding Wind Nebula. The Astrophysical Journal*, vol. 994, pp. 121 (2025).

81. Han, White, Callingham, Lau, **Pope**, Richardson, and Tuthill. *The Formation and Evolution of Dust in the Colliding-wind Binary Apep Revealed by JWST. The Astrophysical Journal*, vol. 994, pp. 122 (2025).

80. Callingham, Tasse, Keers, Kavanagh, Vedantham, Zarka, Bellotti, Cristofari, Bloot, Konijn, Hardcastle, Lamy, Pass, **Pope**, Reid, Röttgering, Shimwell, and Zucca. *Radio burst from a stellar coronal mass ejection. Nature*, vol. 647, pp. 603 (2025).

79. Wu, Han, Williams, Onaka, Callingham, Hankins, Tuthill, Lau, Weigelt, **Pope**, and Richardson. *Constraining properties of dust formed in Wolf-Rayet binary WR 112 using mid-infrared and millimeter observations. arXiv e-prints*, vol. pp. arXiv:2511.19572 (2025).

78. Charles, Desdoigts, **Pope**, Tuthill, Blakely, Johnstone, Ray, Ford, McKernan, and Sivaramakrishnan. *Image reconstruction with the JWST Interferometer. arXiv e-prints*, vol. pp. arXiv:2510.10924 (2025).

77. Desdoigts, **Pope**, Charles, Tuthill, Blakely, Johnstone, Ray, Sivaramakrishnan, Kammerer, Thatte, and Cooper. *AMIGO: a Data-Driven Calibration of the JWST Interferometer. arXiv e-prints*, vol. pp. arXiv:2510.09806 (2025).

76. Dholakia and **Pope**. *Analytic Interferometry of Rotating Stellar Surfaces. arXiv e-prints*, vol. pp. arXiv:2509.25433 (2025).

75. Dholakia, Dholakia, and **Pope**. *A General, Differentiable Transit Model for Ellipsoidal Occulters: Derivation, Application, and Forecast of Planetary Oblateness and Obliquity Constraints with JWST. The Astrophysical Journal*, vol. 987, pp. 150 (2025).

74. Richardson, Henson, Lieb, Kehl, Lau, Williams, Corcoran, Callingham, Chené, Gull, Hamaguchi, Han, Hankins, Hill, Hoffman, Mackey, Moffat, **Pope**, Pradhan, Russell, Sander, St-Louis, Stevens, Tuthill, Weigelt, and White. *Carbon-rich Dust Injected into the Interstellar Medium by Galactic WC Binaries Survives for Hundreds of Years. The Astrophysical Journal*, vol. 987, pp. 160 (2025).

73. McDougall, Davis, and **Pope**. *LITMUS: Bayesian Lag Recovery in Reverberation Mapping with Fast Differentiable Models. arXiv e-prints*, vol. pp. arXiv:2505.09832 (2025).

72. Bloot, Vedantham, Kavanagh, Callingham, and **Pope**. *Catching the wisps: Stellar mass-loss limits from low-frequency radio observations. Astronomy and Astrophysics*, vol. 695, pp. A176 (2025).

71. Albert, Leggett, Calissendorff, Vandal, Kirkpatrick, Bardalez Gagliuffi, De Furio, Meyer, Beichman, Burgasser, Cushing, Faherty, Fontanive, Gelino, Gizis, Greenbaum, Martinache, N'Diaye, **Pope**, Roellig, Sahlmann, Sivaramakrishnan, and Ygouf. *JWST 1.5 μm and 4.8 μm Photometry of Y Dwarfs. The Astronomical Journal*, vol. 169, pp. 163 (2025).

70. Blakely, Johnstone, Cugno, Sivaramakrishnan, Tuthill, Dong, **Pope**, et al. *The James Webb Interferometer: Space-based Interferometric Detections of PDS 70 b and c at 4.8 μm. The Astronomical Journal*, vol. 169, pp. 137 (2025).

69. Driessen, Pritchard, Murphy, Heald, Robrade, Das, Duchesne, Kaplan, Lenc, Lynch, Mitchell-Bolton, **Pope**, Rose, Stelzer, Wang, and Zic. *The Sydney Radio Star Catalogue: Properties of radio stars at megahertz to gigahertz frequencies. Publications of the Astronomical Society of Australia*, vol. 41, pp. e084 (2024).

68. Callingham, **Pope**, et al. *Radio signatures of star-planet interactions, exoplanets and space weather. Nature Astronomy*, vol. 8, pp. 1359 (2024).

67. Fitzmaurice, Stefánsson, Kavanagh, Mahadevan, Cañas, Winn, Robertson, Ninan, Albrecht, Callingham, Cochran, Delamer, Ford, Kanodia, Lin, Marcussen, **Pope**, Ramsey, Roy, Vedantham, and Wright. *Astrometry and Precise Radial Velocities Yield a Complete Orbital Solution for the Nearby Eccentric Brown Dwarf LHS 1610 b. The Astronomical Journal*, vol. 168, pp. 140 (2024).

66. Tuthill, Betters, Charles, Crous, Deagan, Desdoigts, Doelman, George, Grattan, Guyon, Holland, Klupar, Langford, Larkin, Luk, Montet, Nelson, **Pope**, Piroscia, Snik, Taras, Wong, and Worden. *Getting to know the neighbours: Earth analogues in Alpha Centauri with the TOLIMAN space telescope. Space Telescopes and Instrumentation 2024: Optical, Infrared, and Millimeter Wave*, vol. 13092, pp. 130920C (2024).

65. Charles, Langford, Desdoigts, Crous, Luk, Betters, **Pope**, and Tuthill. *Strategies to mitigate effects of pointing error for the TOLIMAN space telescope. Advances in Optical and Mechanical Technologies for Telescopes and Instrumentation VI*, vol. 13100, pp. 1310017 (2024).

64. Desdoigts, **Pope**, and Tuthill. *Differentiable modelling and data analysis for the JWST aperture masking interferometer. Optical and Infrared Interferometry and Imaging IX*, vol. 13095, pp. 1309513 (2024).

63. Desdoigts, **Pope**, Gully-Santiago, and Tuthill. *Differentiable Optics with dLux II: Optical Design Maximising Fisher Information. arXiv e-prints*, vol. pp. arXiv:2406.08704 (2024).

62. Xin, Pueyo, Laugier, Pogorelyuk, Douglas, **Pope**, and Cahoy. *Coronagraphic Data Post-processing Using Projections on Instrumental Modes. The Astrophysical Journal*, vol. 963, pp. 96 (2024).

61. Bloot, Callingham, Vedantham, Kavanagh, **Pope**, Climent, Guirado, Peña-Moñino, and Pérez-Torres. *Phenomenology and periodicity of radio emission from the stellar system AU Microscopii. Astronomy and Astrophysics*, vol. 682, pp. A170 (2024).

60. Owens, Lockwood, Barnard, Usoskin, Hayakawa, **Pope**, and McCracken. *Reconstructing Sunspot Number by Forward-Modelling Open Solar Flux. Solar Physics*, vol. 299, pp. 3 (2024).

59. Zhou, Bieryla, Huang, Latham, Morrissey, **Pope**, Quinn, and Wright. *Probing active atmospheric erosion across an adolescent planet system. HST Proposal*, vol. pp. 17482 (2023).

58. Desdoigts, **Pope**, Dennis, and Tuthill. *Differentiable optics with ∂Lux: I—deep calibration of flat field and phase retrieval with automatic differentiation. Journal of Astronomical Telescopes, Instruments, and Systems*, vol. 9, pp. 028007 (2023).

57. Calissendorff, De Furio, Meyer, Albert, Aganze, Ali-Dib, Bardalez Gagliuffi, Baron, Beichman, Burgasser, Cushing, Faherty, Fontanive, Gelino, Gizis, Greenbaum, Kirkpatrick, Leggett, Martinache, Mary, N'Diaye, **Pope**, Roellig, Sahlmann, Sivaramakrishnan, Thorngren, Ygouf, and Vandal. *JWST/NIRCam Discovery of the First Y+Y Brown Dwarf Binary: WISE J033605.05-014350.4. The Astrophysical Journal*, vol. 947, pp. L30 (2023).

56. Sharma, Zhang, Dennis, and **Pope**. *ticktack: A Python package for carbon box modelling. The Journal of Open Source Software*, vol. 8, pp. 5084 (2023).

55. Callingham, Shimwell, Vedantham, Bassa, O'Sullivan, Yiu, Bloot, Best, Hardcastle, Haverkorn, Kavanagh, Lamy, **Pope**, et al. *V-LoTSS: The circularly polarised LOFAR Two-metre Sky Survey. Astronomy and Astrophysics*, vol. 670, pp. A124 (2023).

54. Sivaramakrishnan, Tuthill, Lloyd, Greenbaum, Thatte, Cooper, Vandal, Kammerer, Sanchez-Bermudez, **Pope**, et al. *The Near Infrared Imager and Slitless Spectrograph for the James Webb Space Telescope. IV. Aperture Masking Interferometry. Publications of the Astronomical Society of the Pacific*, vol. 135, pp. 015003 (2023).

53. Zhang, Sharma, Dennis, Scifo, Kuitems, Büntgen, Owens, Dee, and **Pope**. *Modelling cosmic radiation events in the tree-ring radiocarbon record. Proceedings of the Royal Society of London Series A*, vol. 478, pp. 20220497 (2022).

52. Owens, Barnard, **Pope**, Lockwood, Usoskin, and Asvestari. *Solar Energetic-Particle Ground-Level Enhancements and the Solar Cycle. Solar Physics*, vol. 297, pp. 105 (2022).

51. Hey, Murphy, Foreman-Mackey, Bedding, **Pope**, and Hogg. *maelstrom: Forward modeling of pulsating stars in binaries. Astrophysics Source Code Library*, vol. pp. ascl:2205.005 (2022).

50. Callingham, Vedantham, Shimwell, **Pope**, et al. *The population of M dwarfs observed at low radio frequencies. Nature Astronomy*, vol. 5, pp. 1233 (2021).

49. Hey, Montet, **Pope**, Murphy, and Bedding. *A Search for Transits among the Delta Scuti Variables in Kepler. The Astronomical Journal*, vol. 162, pp. 204 (2021).

48. Hill, Kane, Campante, Li, Dalba, Brandt, White, **Pope**, et al. *Asteroseismology of iota Draconis and Discovery of an Additional Long-period Companion. The Astronomical Journal*, vol. 162, pp. 211 (2021).

47. Handberg, Lund, White, Hall, Buzasi, **Pope**, Hansen, von Essen, Carboneau, Huber, Vanderspek, Fausnaugh, Tenenbaum, Jenkins, and T'DA Collaboration. *TESS Data for Asteroseismology: Photometry. The Astronomical Journal*, vol. 162, pp. 170 (2021).

46. Wong, **Pope**, Desdoigts, Tuthill, Norris, and Betters. *Phase retrieval and design with automatic differentiation: tutorial. Journal of the Optical Society of America B Optical Physics*, vol. 38, pp. 2465 (2021).

45. **Pope**, Callingham, Feinstein, Günther, Vedantham, Ansdell, and Shimwell. *The TESS View of LOFAR Radio-emitting Stars. The Astrophysical Journal*, vol. 919, pp. L10 (2021).

44. Callingham, **Pope**, et al. *Low-frequency monitoring of flare star binary CR Draconis: long-term electron-cyclotron maser emission. Astronomy and Astrophysics*, vol. 648, pp. A13 (2021).

43. **Pope**, Pueyo, Xin, and Tuthill. *Kernel Phase and Coronagraphy with Automatic Differentiation. The Astrophysical Journal*, vol. 907, pp. 40 (2021).

42. Han, Tuthill, Lau, Soulain, Callingham, Williams, Crowther, **Pope**, and Marcote. *The extreme colliding-wind system Apep: resolved imagery of the central binary and dust plume in the infrared. Monthly Notices of the Royal Astronomical Society*, vol. 498, pp. 5604 (2020).

41. Lancaster, Greene, Ting, Koposov, **Pope**, and Beaton. *A Mystery in Chamaeleon: Serendipitous Discovery of a Galactic Symbiotic Nova. The Astronomical Journal*, vol. 160, pp. 125 (2020).

40. Hey, Murphy, Foreman-Mackey, Bedding, **Pope**, and Hogg. *Maelstrom: A Python package for identifying companions to pulsating stars from their light travel time variations. The Journal of Open Source Software*, vol. 5, pp. 2125 (2020).

39. Hey, Murphy, Foreman-Mackey, Bedding, **Pope**, and Hogg. *Forward Modeling the Orbits of Companions to Pulsating Stars from Their Light Travel Time Variations. The Astronomical Journal*, vol. 159, pp. 202 (2020).

38. Vedantham, Callingham, Shimwell, Tasse, **Pope**, Bedell, Snellen, Best, Hardcastle, Haverkorn, Mechev, O'Sullivan, Röttgering, and White. *Coherent radio emission from a quiescent red dwarf indicative of star-planet interaction. Nature Astronomy*, vol. 4, pp. 577 (2020).

37. **Pope**, Bedell, Callingham, Vedantham, Snellen, Price-Whelan, and Shimwell. *No Massive Companion to the Coherent Radio-emitting M Dwarf GJ 1151. The Astrophysical Journal*, vol. 890, pp. L19 (2020).

36. Callingham, Crowther, Williams, Tuthill, Han, **Pope**, and Marcote. *Two Wolf-Rayet stars at the heart of colliding-wind binary Apep. Monthly Notices of the Royal Astronomical Society*, vol. 495, pp. 3323 (2020).

35. Scifo, Kuitems, Neocleous, **Pope**, Miles, Jansma, Doeve, Smith, Miyake, and Dee. *Radiocarbon Production Events and their Potential Relationship with the Schwabe Cycle. Scientific Reports*, vol. 9, pp. 17056 (2019).

34. Lecoanet, Cantiello, Quataert, Couston, Burns, **Pope**, Jermyn, Favier, and Le Bars. *Low-frequency Variability in Massive Stars: Core Generation or Surface Phenomenon?. The Astrophysical Journal*, vol. 886, pp. L15 (2019).

33. **Pope**, White, Farr, Yu, Greklek-McKeon, Huber, Aerts, Aigrain, Bedding, Boyajian, Creevey, and Hogg. *The K2 Bright Star Survey. I. Methodology and Data Release. The Astrophysical Journal Supplement Series*, vol. 245, pp. 8 (2019).

32. Eisner, **Pope**, Aigrain, Barragán, White, Huang, Lintott, and Volkov. *A Ghost in the Toast: TESS Background Light Produces a False "Transit" Across τ Ceti. Research Notes of the American Astronomical Society*, vol. 3, pp. 145 (2019).

31. Plachy, Molnár, Bódi, Skarka, Szabó, Szabó, Klagyivik, Sódor, and **Pope**. *Extended Aperture Photometry of K2 RR Lyrae stars. The Astrophysical Journal Supplement Series*, vol. 244, pp. 32 (2019).

30. **Pope** et al. *The Kepler Smear Campaign: Light Curves for 102 Very Bright Stars. The Astrophysical Journal Supplement Series*, vol. 244, pp. 18 (2019).

29. Bowman, Burssens, Pedersen, Johnston, Aerts, Buysschaert, Michielsen, Tkachenko, Rogers, Edelmann, Ratnasingam, Simón-Díaz, Castro, Moravveji, **Pope**, White, and De Cat. *Low-frequency gravity waves in blue supergiants revealed by high-precision space photometry. Nature Astronomy*, vol. 3, pp. 760 (2019).

28. Callingham, Tuthill, **Pope**, Williams, Crowther, Edwards, Norris, and Kedziora-Chudczer. *Anisotropic winds in a Wolf-Rayet binary identify a potential gamma-ray burst progenitor. Nature Astronomy*, vol. 3, pp. 82 (2019).

27. **Pope**, Withers, Callingham, and Vogt. *Exoplanet transits with next-generation radio telescopes. Monthly Notices of the Royal Astronomical Society*, vol. 484, pp. 648 (2019).

26. Callingham, Vedantham, **Pope**, Shimwell, and LoTSS Team. *LoTSS-HETDEX and Gaia: Blind Search for Radio Emission from Stellar Systems Dominated by False Positives. Research Notes of the American Astronomical Society*, vol. 3, pp. 37 (2019).

25. Arentoft, Grundahl, White, Slumstrup, Handberg, Lund, Brogaard, Andersen, Silva Aguirre, Zhang, Chen, Yan, **Pope**, et al. *Asteroseismology of the Hyades red giant and planet host ε Tauri. Astronomy and Astrophysics*, vol. 622, pp. A190 (2019).

24. Farr, **Pope**, Davies, North, White, Barrett, Miglio, Lund, Antoci, Fredslund Andersen, Grundahl, and Huber. *Aldebaran b's Temperate Past Uncovered in Planet Search Data. The Astrophysical Journal*, vol. 865, pp. L20 (2018).

23. Tuthill, Bendek, Guyon, Horton, Jeffries, Jovanovic, Klupar, Larkin, Norris, **Pope**, and Shao. *The TOLIMAN space telescope. Optical and Infrared Interferometry and Imaging VI*, vol. 10701, pp. 107011J (2018).

22. Plavchan et al. *EarthFinder: A Precise Radial Velocity Probe Mission Concept For the Detection of Earth-Mass Planets Orbiting Sun-like Stars. arXiv e-prints*, vol. pp. arXiv:1803.03960 (2018).

21. White, **Pope**, et al. *Beyond the Kepler/K2 bright limit: variability in the seven brightest members of the Pleiades. Monthly Notices of the Royal Astronomical Society*, vol. 471, pp. 2882 (2017).

20. Dee, **Pope**, Miles, Manning, and Miyake. *Supernovae and Single-Year Anomalies in the Atmospheric Radiocarbon Record. Radiocarbon*, vol. 59, pp. 293 (2017).

19. Pepper, Gillen, Parviainen, Hillenbrand, Cody, Aigrain, Stauffer, Vrba, David, Lillo-Box, Stassun, Conroy, **Pope**, and Barrado. *A Low-mass Exoplanet Candidate Detected by K2 Transiting the Praesepe M Dwarf JS 183. The Astronomical Journal*, vol. 153, pp. 177 (2017).

18. **Pope**. *Observing bright stars and their planets from the Earth and from space. Ph.D. Thesis*, vol. pp. (2017).

17. Hjørringgaard, Silva Aguirre, White, Huber, **Pope**, Casagrande, Justesen, and Christensen-Dalsgaard. *Testing stellar evolution models with the retired A star HD 185351. Monthly Notices of the Royal Astronomical Society*, vol. 464, pp. 3713 (2017).

16. **Pope**. *Kernel phase and kernel amplitude in Fizeau imaging. Monthly Notices of the Royal Astronomical Society*, vol. 463, pp. 3573 (2016).

15. **Pope**, Parviainen, and Aigrain. *Transiting exoplanet candidates from K2 Campaigns 5 and 6. Monthly Notices of the Royal Astronomical Society*, vol. 461, pp. 3399 (2016).

14. Dee and **Pope**. *Anchoring historical sequences using a new source of astro-chronological tie-points. Proceedings of the Royal Society of London Series A*, vol. 472, pp. 20160263 (2016).

13. Kraus et al. *Planet Formation Imager (PFI): science vision and key requirements. Optical and Infrared Interferometry and Imaging V*, vol. 9907, pp. 99071K (2016).

12. Aigrain, Parviainen, and **Pope**. *K2SC: flexible systematics correction and detrending of K2 light curves using Gaussian process regression. Monthly Notices of the Royal Astronomical Society*, vol. 459, pp. 2408 (2016).

11. Aigrain, Parviainen, and **Pope**. *K2SC: K2 Systematics Correction. Astrophysics Source Code Library*, vol. pp. ascl:1605.012 (2016).

10. **Pope**, Tuthill, Hinkley, Ireland, Greenbaum, Latyshev, Monnier, and Martinache. *The Palomar kernel-phase experiment: testing kernel phase interferometry for ground-based astronomical observations. Monthly Notices of the Royal Astronomical Society*, vol. 455, pp. 1647 (2016).

9. **Pope**, White, Huber, Murphy, Bedding, Caldwell, Sarai, Aigrain, and Barclay. *Photometry of very bright stars with Kepler and K2 smear data. Monthly Notices of the Royal Astronomical Society*, vol. 455, pp. L36 (2016).

8. David, Stauffer, Hillenbrand, Cody, Conroy, Stassun, **Pope**, Aigrain, Gillen, Collier Cameron, Barrado, Rebull, Isaacson, Marcy, Zhang, Riddle, Ziegler, Law, and Baranec. *HII 2407: An Eclipsing Binary Revealed By K2 Observations of the Pleiades. The Astrophysical Journal*, vol. 814, pp. 62 (2015).

7. Sivaramakrishnan, Cheetham, Greenbaum, Tuthill, Acton, **Pope**, Martinache, Thatte, and Nelan. *Non-redundant masking ideas on JWST. Space Telescopes and Instrumentation 2014: Optical, Infrared, and Millimeter Wave*, vol. 9143, pp. 91433S (2014).

6. **Pope**, Thatte, Burruss, Tecza, Clarke, and Cotter. *Wavefront sensing from the image domain with the Oxford-SWIFT integral field spectrograph. Adaptive Optics Systems IV*, vol. 9148, pp. 914859 (2014).

5. **Pope**, Cvetojevic, Cheetham, Martinache, Norris, and Tuthill. *A demonstration of wavefront sensing and mirror phasing from the image domain. Monthly Notices of the Royal Astronomical Society*, vol. 440, pp. 125 (2014).

4. White, Huber, Maestro, Bedding, Ireland, Baron, Boyajian, Che, Monnier, **Pope**, et al. *Interferometric radii of bright Kepler stars with the CHARA Array: 9 Cygni and 16 Cygni A and B. Monthly Notices of the Royal Astronomical Society*, vol. 433, pp. 1262 (2013).

3. **Pope**, Martinache, and Tuthill. *Dancing in the Dark: New Brown Dwarf Binaries from Kernel Phase Interferometry. The Astrophysical Journal*, vol. 767, pp. 110 (2013).

2. Tuniz, **Pope**, Wang, Large, Atakaramians, Min, Pogson, Lewis, Bendavid, Argyros, Fleming, and Kuhlmey. *Spatial dispersion in three-dimensional drawn magnetic metamaterials. Optics Express*, vol. 20, pp. 11924 (2012).

1. Tuthill, Jovanovic, Lacour, Lehmann, Ams, Marshall, Lawrence, Withford, Robertson, Ireland, **Pope**, and Stewart. *Photonic technologies for a pupil remapping interferometer. Optical and Infrared Interferometry II*, vol. 7734, pp. 77341P (2010).