Steph Sallum

CONTACT INFORMATION

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EDUCATION

University of Arizona, Tucson, Arizona USA

Ph.D. in Astronomy, August 2017
National Science Foundation Graduate Research Fellow 2013-2016
Space Grant Graduate Fellow 2012-2013
Advisor: Josh Eisner

Massachusetts Institute of Technology, Cambridge, Massachusetts USA

B.S. in Planetary Astronomy and Physics Double Major, with Writing Minor, June 2012
Advisors: James L. Elliot, Richard P. Binzel
Cumulative GPA: 4.7/5.0

POSITIONS

- **Assistant Professor** UC Irvine 2020-
- **Assistant Astronomer** UC Irvine 2019-2020
- **NSF Postdoctoral Fellow** UC Santa Cruz 2017-2020
- **UC Chancellor's Postdoctoral Fellow** UC Santa Cruz 2017-2019
- **NSF Graduate Fellow** University of Arizona 2013-2016
- **Space Grant Graduate Fellow** University of Arizona 2012-2013
- **Undergraduate Researcher** MIT Planetary Astronomy Laboratory, 2009-2012
- **NSF REU Summer Researcher** University of Hawaii, 2011
- **NSF REU Summer Researcher** Maria Mitchell Observatory, 2010
- **Systems Engineering Intern** Raytheon Sea Power Capabilities Center, 2009

HONORS AND AWARDS

- **UC Chancellor's Fellowship** 2017
- **NSF Postdoctoral Research Fellowship** 2017
- **University of Arizona Astronomy Department Scholarship Award** 2016
- **NSF Graduate Research Fellowship** 2013
- **NOAO Project Astro Partner of the Year** 2014
- **Space Grant Fellow** University of Arizona 2012 - 2013
- **William T. Haebler Memorial Scholar** Massachusetts Institute of Technology 2010 - 2012
- **Innovation Challenge Winner** Raytheon Seapower Capabilities Center, 2009

GRANTS

- 2023: PI, UC Observatories, *Project Scientist Support for SCALES and Other UCO Instruments*, **$14,903**
- 2022: PI, Mt. Cuba Astronomical Foundation, *A Precision Calibration Unit for a Next-Generation Exoplanet Imaging Spectrograph*, **$107,961**
- 2022: PI, Heising Simons Foundation, *Amendment: Enabling a New Era of Exoplanet Direct Imaging and Spectroscopy*, **$83,857**
- 2022: PI, NSF MRI, *Development of an Exoplanet Imaging Spectrograph for Keck Observatory*, **$3.5M**
- 2022: PI, Space Telescope Science Institute, *High Resolution, High Contrast Kernel Phase Imaging with NIRCam*, **$43,339**
- 2022: PI, Space Telescope Science Institute, *High Contrast Imaging of Exoplanets and Exoplanetary Systems with JWST*, **$45,260**
- 2021: PI, American Astronomical Society, *Physics and Astronomy Community Excellence*, **$48,000**

- 2021: PI, W. M. Keck Observatory, *SCALES: MRI Proposal Preparation and an Imaging Channel Upgrade*, **$38,659**
- 2021: PI, NSF ATI (UCLA Subaward), *Collaborative Research: Mastering the photonic lantern: The key to transformative diffraction-limited spectroscopy*, **$40,726**
- 2021: PI, UC Observatories, *Visible Light Diffraction-Limited Polarimetric Imaging at Lick*, **$17,127**
- 2021: PI, American Astronomical Society, *Physics and Astronomy Community Excellence*, **$48,000**
- 2020: PI, NSF AAG, *Imaging Planet Formation Inside the Diffraction Limit*, **$449,511**
- 2020: PI, Heising Simons Foundation, *A Robust SCExAO Kernel Phase Pipeline for Young Exoplanet Characterization*, **$376,083**
- 2019: PI, W. M. Keck Observatory, *A Holographic Mask for the OSIRIS Imager*, **$65,000**
- 2017-2020: PI, NSF AAPF, *Discovering and Characterizing Protoplanetary Systems Using Novel Imaging Techniques*, **$300,000**

Invited Talks

- **Exoclimes VI Keynote Exoplanet Instrumentation Review**, Exeter, UK, 2023
- **Kepler Distinguished Lecture**, Mt. San Antonio College, Walnut, CA, USA, 2023
- **UCLA Astronomy Colloquium**, Los Angeles, CA, USA, 2023
- **UC Berkeley Astronomy Colloquium**, Berkeley, CA, USA, 2023
- **Notre Dame Astrophysics Seminar**, Virtual, 2022
- **UCI School of Physical Sciences Breakfast Talk**, Irvine, CA, USA, 2022
- **Lick Observatory Music of the Spheres**, Mount Hamilton, CA, USA, 2022
- **Keck Diffraction Limited Visible Light Workshop**, Virtual, 2022
- **Osher Lifelong Learning Institute**, Irvine, CA, USA, 2021
- **Caltech / IPAC Lunch Seminar**, Virtual, 2021
- **UCI School of Physical Sciences Virtual Lecture Series**, 2021
- **ExSoCal**, Hosted Virtually by UC Riverside, 2020
- **UC Berkeley SCIPS Seminar**, Berkeley, CA, 2020
- **Joint NOAO Steward Colloquium**, Tucson, AZ, USA, 2019
- **UC Irvine Astro Seminar**, Irvine, CA, USA, 2018
- **Institute for Astronomy Colloquium**, Honolulu, HI, USA, 2018
- **UC Santa Barbara Astrophysics Colloquium**, Santa Barbara, CA, USA, 2018
- **UC San Diego Astrophysics Astrophysics Seminar**, San Diego, CA, USA, 2018
- **42nd COSPAR Scientific Assembly**, Pasadena, CA, USA, 2018
- **UC Irvine Astro Seminar**, Irvine, CA, USA, 2018
- **UC Santa Cruz Astronomy Colloquium**, Santa Cruz, CA, USA, 2018
- **Harvard CfA Stars and Planets Seminar**, Cambridge, MA, USA, 2017
- **UC Santa Cruz FLASH**, Santa Cruz, CA, USA, 2016
- **SPIE Astronomical Telescopes and Instrumentation**, Edinburgh, UK, 2016

Contributed Talks

- **Spirit of Lyot**, Leiden, Netherlands, 2022
- **Keck Science Meeting**, Virtual, 2021
- **STScI Spring Symposium: Towards the Comprehensive Characterization of Exoplanets: Science at the Interface of Multiple Measurement Techniques**, Virtual, 2021
- **Ground-based thermal infrared astronomy – past, present and future**, Virtual ESO Conference, 2020
- **Keck Science Meeting**, Virtual, 2020
- **KAPA Science Meeting**, Virtual, 2020
- **Keck Science Meeting**, Los Angeles, CA, USA, 2019
- **NSF AAPF Symposium**, Seattle, WA, USA, 2019
- **SPIE Astronomical Telescopes and Instrumentation**, Austin, TX, USA, 2018
- **NSF AAPF Symposium**, Washington DC, USA, 2018
- **Bay Area Exoplanets Meeting**, Moffet Field, CA, USA, 2017
- **LBT Users Meeting**, Florence, Italy, 2017

- **AAS 229**, Grapevine, TX, USA, 2017
- **Exoplanets in the Era of Extremely Large Telescopes**, Monterey, CA, 2016
- **Resolving Planet Formation in the Era of ALMA and Extreme AO**, Santiago, CL, 2016
- **Sant Cugat Forum for Astrophysics: Workshop on Young Solar Systems**, Sant Cugat, ES, 2016
- **Protoplanetary Discussions**, Edinburgh, UK, 2016
- **Star and Planet Formation in the Southwest**, Tucson, AZ, 2015

PROFESSIONAL SERVICE

- ESO Scientific Technical Committee, La Silla Paranal Committee at-large member, 2021-present
- Chair, SPIE Optical and Infrared Interferometry and Imaging, 2019-present
- UC Observatories Keck Galactic TAC Member, 2020-present
- SPIE Techniques and Instrumentation for Detection of Exoplanets XI Scientific Organizing Committee, 2023
- Heising Simons Foundation 51 Pegasi b Postdoctoral Fellowship Review Committee, 2022
- Referee for: ApJ, A&A, JATIS, Applied Optics, Nature Astronomy
- ESO GRAVITY+ Milestone 1 Review Board 2022
- ESO GRAVITY+ Phase A Review Board 2021
- Chair, Virtual Masking & Kernel Phase Hackathon Workshop, UCI, 2021
- NOAO US ELT KSP Lead, 2018

Department Service

- UCI Physics & Astronomy Graduate Admissions Committee, 2020-present
- Faculty Advisor, UCI Physics and Astronomy Community Excellence, 2020-present
- UCSC Arxiv Coffee Moderator, 2017-2018
- University of Arizona Admissions Committee, 2016
- University of Arizona Astronomy Department Graduate Student Council, 2015-2016

Diversity, Equity, Inclusion, and Outreach

- Cal-Bridge Academic Year Mentor, 2022-present
- CAMPARE Summer Student Mentor, 2021-present
- Faculty Advisor, AAS National Osterbrock Leadership Program, 2020-present
- Faculty Advisor, UCI Physics and Astronomy Community Excellence, 2020-present
- UCSC Program for Inmate Education Director, 2018-2020
- UCSC Program for Inmate Education Volunteer, 2017-2020
- UCSC Astronomy on Tap SOC, 2018-2020
- Supernova Foundation Mentor, 2018-2019
- Tucson Women in Astronomy Undergraduate Mentor, 2016
- Huachuca Amateur Astronomy Club Guest Speaker, 2016
- Saguaro Amateur Astronomy Club Guest Speaker, 2016
- CAMPARE Summer Student Mentor, 2013
- NOAO Project Astro Partner, 2012-2015

MEDIA

- NSF MRI to support the Slicer Combined with Array of Lenslets for Exoplanet Spectroscopy featured in UCI SoPS News, 2022
- UCI's Physics and Astronomy Community Excellence joins AAS National Osterbrock Leadership Program, UCI SoPS News & AAS News, 2021
- Heising Simons Foundation supporting development of filled-aperture kernel phase tools for Subaru/SCExAO/CHARIS, UCI Physics & Astronomy News, 2020
- Accreting protoplanets featured in Nature Podcast, USA Today, elsewhere, 2015
- First observations of a stellar occultation by 50000 Quaoar featured in MIT Technology Review, 2011