

Stephen Pardy

CONTACT	Astronomy Department University of Wisconsin - Madison 475 N. Charter St., Madison, WI 53706	spardy@astro.wisc.edu stephenpardy.com
EDUCATION	<i>Ph.D.</i> , Astronomy – expected May 2018 <i>Masters</i> , Astronomy – December 2015 University of Wisconsin - Madison <i>Bachelor of Arts</i> , Physics with an Astronomy Emphasis – May 2013 Macalester College - St. Paul, MN	
AWARDS and GRANTS	University of Wisconsin - Madison Travel Grants - \$600 (May 2016), \$1,500 (November 2016), \$1,200 (November 2017). Stebbins Award for significant research achievement. Macalester College Dr. Sherman W. Schultz Memorial Award for academic excellence and outstanding research. AAS 221 Chambliss Astronomy Achievement Student Award	
RESEARCH EXPERIENCE	<i>Research Assistant</i> University of Wisconsin - Madison	Fall 2013 - Current
	<i>ISIMA Summer Student</i> International Summer Institute for Modeling in Astrophysics - CITA, Toronto	Summer 2014
	<ul style="list-style-type: none">• Used restricted 3-Body models and Bayesian techniques to study the tidal stream of NGC 5466 and the dark matter potential of the Milky Way.	
	<i>REU Summer Student</i> National Radio Astronomy Observatory, Charlottesville, VA	Summer 2012
	<ul style="list-style-type: none">• Wrote IDL code to cluster CO emission data from M51.• Reduced data for VLA summer student observing project.	
	<i>Research Assistant</i> Physics and Astronomy Department, Macalester College, St. Paul, MN	Summer 2011
	<ul style="list-style-type: none">• Reduced GBT and VLA data for the Lyman Alpha Reference Sample.• Published paper with analysis from HI and Lyα emission in LARS.	
TEACHING EXPERIENCE	<i>Teaching Assistant</i> Astronomy 103 The Evolving Universe: Stars, Galaxies, and Cosmology Astronomy 104 Our Exploration of the Solar System	University of Wisconsin - Madison Spring 2014 Fall 2016, Fall 2017
	<ul style="list-style-type: none">• Designed classroom material and led six discussion sections per week	

Substitute Lecturer
Astronomy 200

University of Wisconsin - Madison
Spring 2017

- Taught major-level introductory astronomy lectures
- Led classroom activity on analyzing GAIA proper motion data

Astronomy Preceptor
Observational Astronomy

Macalester College, St. Paul, MN
Fall 2012

- Teaching assistant and telescope operator for introductory astronomy class.

PUBLICATIONS REFEREED PAPERS

12. Bridge, J. S.; Hayes, M., Melinder, J.; Östlin, G.; et al. ApJ Accepted – *The Lyman Alpha Reference Sample. VIII. Characterizing Lyman-Alpha Scattering in Nearby Galaxies*
11. Chen, B.; D’Onghia, E.; **Pardy, S.**; Pasquali, A.; et al. ApJ submitted – *Chemo-Dynamical Clustering applied to APOGEE data: Re-Discovering Globular Clusters*
10. **Pardy, S.A.**; Cannon, J.M.; Östlin, G.; Hayes, M.; Bergvall, N. 2016 AJ, 152, 178 – *Detection of HI in Emission in the LY α Emitting Galaxy Haro 11*
9. **Pardy, S.A.**; D’Onghia, E.; Athanassoula, E.; Wilcots, E. M.; Sheth, K., 2016 ApJ, 827, 149 – *Tidally-Induced Offset Disks in Magellanic Spiral Galaxies*
8. Herenz, E.C.; Gruyters, P.; Orlitova, I.; Hayes, M.; et al. 2016 A&A, 587, 78 – *The Lyman alpha reference sample. VII. Spatially resolved H α kinematics*
7. de Swardt, B.; Sheth, K; Kim, T.; **Pardy, S.**; et al. 2015 ApJ, 808, 90– *The Odd Offset between the Galactic Disk and Its Bar in NGC 3906*
6. Guaita, L.; Melinder, J.; Hayes, M.; Östlin, G. et al., A&A, 576, A51– *The Lyman alpha reference sample: IV. Morphology at low and high redshift*
5. Östlin, G.; Hayes, M.; Duval, F.; Sandberg, A.; et al. 2014 ApJ, 797, 11 – *The Lyman-alpha Reference Sample: I. Survey outline and first results for Markarian 259*
4. **Pardy, S.A.**; Cannon, J.M.; Östlin, G.; Hayes, M.; et al. 2014 ApJ, 794, 101 – *The Lyman Alpha Reference Sample: III. Properties of the Neutral ISM from GBT and VLA Observations*
3. Bernstein-Cooper, E. Z.; Cannon, J. M.; Elson, E. C.; Warren, S.R.; et al. 2014, AJ, 148, 35 – *ALFALFA Discovery of the Nearby Gas-rich Dwarf Galaxy Leo P. V. Neutral Gas Dynamics and Kinematics*
2. Hayes, M.; Östlin, G.; Duval, F.; Sandberg, A; et al. 2014, ApJ, 782, 6 – *The Lyman alpha Reference Sample: II. HST imaging results, integrated properties and trends*
1. Cannon, J. M.; Bernstein-Cooper, E. Z.; Cave, I. M.; Harris, J. B.; et al. 2012, AJ, 144, 82 – *The Neutral Gas Dynamics of the Nearby Magellanic Irregular Galaxy UGCA 105*

CONFERENCE PUBLICATIONS AND CONTRIBUTED TALKS

The Role of Gas in Galaxy Dynamics, University of Malta

Feedback in the Magellanic Clouds Workshop, Space Telescope Science Institute

Lyman Alpha as an Astrophysical Tool Workshop, NORDITA, Stockholm, Sweden

Pardy, S., et al. 2013, AAS Meeting Abstracts, 221, #146.20

Pardy, S., et al. 2012, AAS Meeting Abstracts #219, 219, #244.05

**SUCCESSFUL
TELESCOPE
PROPOSALS**

PI proposals

Jansky Very Large Array 45.5 hours – VLA/17B-287

Robert C. Byrd 100m Green Bank Telescope 10 hours – GBT/14B-306

PROGRAMMING> 10,000 lines: Python
SKILLS > 1,000 lines: Javascript, IDL, C
< 1,000 lines: Java, bash, C++, Ruby

Tools: \LaTeX , Mathematica, Git, Jekyll, Amazon Web Services
Packages: Pandas, numpy/scipy, D3.js

PROFESSIONAL DEVELOPMENT Astrostatistics Summer School Summer 2015
Pennsylvania State University

GAIA data workshop Fall, 2016
Max Planck Institute for Astrophysics

Scaling to Petascale workshop Summer 2017
University of Chicago

**OUTREACH and
SERVICE**

- Referee - Monthly Notices of the Royal Astronomical Society
- Webmaster and LOC member for ‘The Role of Gas in Galaxies’ - international conference with 130+ attendees.
- Televised lecture at UW-Madison Space Place
- Department service: Graduate student Chair - 2016, Prospective graduate student organizer - 2014, 2015, 2017
- Public talks and observing at state parks through the ‘Universe in the Park’ program
- Telescope operator for public observing at Washburn Observatory and Macalester College

Mentoring

- Wisconsin state Science Olympiad competition
- Ramsey Junior High School Science Fair

Undergraduates Mentored:

- William Tyndall 2014 - 2016
- Boquan Chen 2014 - present