



Risa Wechsler

Director, Kavli Institute for Particle Astrophysics and Cosmology (KIPAC) and Professor of Physics and of Particle Physics and Astrophysics

CONTACT INFORMATION

- **Executive Assistant**

Sandra Paz

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Bio

ACADEMIC APPOINTMENTS

- Professor, Physics
- Professor, Particle Physics and Astrophysics

ADMINISTRATIVE APPOINTMENTS

- Director, Kavli Institute for Particle Astrophysics and Cosmology, (2018- present)
- Fundamental Physics Directorate Management Team, SLAC National Accelerator Lab, (2018- present)
- Assistant Director of Scientific Programs, Kavli Institute of Particle Astrophysics and Cosmology, (2013-2018)
- Co-Spokesperson, Dark Energy Spectroscopic Instrument, (2014-2018)
- Chair, Physics Department Committee on Equity & Inclusion, (2016-2019)
- Head, KIPAC Theory Group, SLAC, (2009- present)

HONORS AND AWARDS

- Distinguished Alumna, University of California, Santa Cruz (2022)
- Fellow, American Association for the Advancement of Science (2020)
- Stanford Fellow, Stanford University (2019-2021)
- Fellow, American Physical Society (2017)
- Nina C. Crocker Faculty Scholar, Stanford University (2013-2016)
- Hellman Faculty Scholar, Stanford University (2008)
- Frederick E. Terman Fellow, Stanford University (2006-2012)
- Hubble Fellow, NASA (2003-2006)
- Enrico Fermi Fellow, Enrico Fermi Institute, University of Chicago (2003-2005)

BOARDS, ADVISORY COMMITTEES, PROFESSIONAL ORGANIZATIONS

- Member, Board on Physics and Astronomy, NAS (2021 - present)
- Advisory Board, NOIRLab (2020 - present)

- Board of Fund Managers, Kavli Institute for Cosmology, Cambridge (2020 - present)
- Board of Trustees, Aspen Center for Physics (2020 - present)
- Scientific Advisory Committee, Rubin Observatory / LSST (2016 - present)
- General Member, Aspen Center for Physics (2015 - present)
- Advisory Board, Kavli Institute for Theoretical Physics (2015 - 2019)
- Member, High Energy Physics Advisory Panel (2015 - 2018)

PROFESSIONAL EDUCATION

- PhD, University of California, Santa Cruz (2001)
- SB, Massachusetts Institute of Technology (1996)

LINKS

- Galaxy Formation & Cosmology Group: <http://www.risawechsler.com>

Teaching

COURSES

2021-22

- The Origin and Development of the Cosmos: PHYSICS 16 (Win)

2020-21

- Special Topics in Astrophysics: Structure Formation and Galaxy Formation: PHYSICS 367 (Spr)

2019-20

- The Origin and Development of the Cosmos: PHYSICS 16 (Win)

STANFORD ADVISEES

Doctoral Dissertation Reader (AC)

Andrew Eberhardt, Anthony Flores, Ares Hernandez, Bryen Irving, Justin Myles

Postdoctoral Faculty Sponsor

Maris Arthurs, Simon Birrer, David Goldfinger, Abhishek Sanjay Maniyar, Philip Mansfield, Sandy Yuan, Mia de los Reyes

Doctoral Dissertation Advisor (AC)

Elise Darragh-Ford, Nickolas Kokron, Mahlet Shiferaw, Sebastian Wagner-Carena, Richie Wang

Doctoral Dissertation Co-Advisor (AC)

Diogo Braganca

Doctoral (Program)

Lawrence Peirson, Cyndia Yu, Al Zamora

Publications

PUBLICATIONS

- **Insights into the origin of halo mass profiles from machine learning** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Lucie-Smith, L., Adhikari, S., Wechsler, R. H.
2022; 515 (2): 2164-2177

- **Priors on red galaxy stochasticity from hybrid effective field theory** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Kokron, N., DeRose, J., Chen, S., White, M., Wechsler, R. H.
2022; 514 (2): 2198-2213
- **ADDGALS: Simulated Sky Catalogs for Wide Field Galaxy Surveys** *ASTROPHYSICAL JOURNAL*
Wechsler, R. H., DeRose, J., Busha, M. T., Becker, M. R., Rykoff, E., Evrard, A.
2022; 931 (2)
- **Dark Matter Constraints from a Unified Analysis of Strong Gravitational Lenses and Milky Way Satellite Galaxies** *ASTROPHYSICAL JOURNAL*
Nadler, E. O., Birrer, S., Gilman, D., Wechsler, R. H., Du, X., Benson, A., Nierenberg, A. M., Treu, T.
2021; 917 (1)
- **Searching for Dwarf Galaxies in Gaia DR2 Phase-space Data Using Wavelet Transforms** *ASTROPHYSICAL JOURNAL*
Darragh-Ford, E., Nadler, E. O., McLaughlin, S., Wechsler, R. H.
2021; 915 (1)
- **UniverseMachine: Predicting Galaxy Star Formation over Seven Decades of Halo Mass with Zoom-in Simulations** *ASTROPHYSICAL JOURNAL*
Wang, Y., Nadler, E. O., Mao, Y., Adhikari, S., Wechsler, R. H., Behroozi, P.
2021; 915 (2)
- **The cosmology dependence of galaxy clustering and lensing from a hybrid N-body-perturbation theory model** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Kokron, N., DeRose, J., Chen, S., White, M., Wechsler, R. H.
2021; 505 (1): 1422-1440
- **Hierarchical Inference with Bayesian Neural Networks: An Application to Strong Gravitational Lensing** *ASTROPHYSICAL JOURNAL*
Wagner-Carena, S., Park, J., Birrer, S., Marshall, P. J., Roodman, A., Wechsler, R. H., LSST Dark Energy Sci Collaboration
2021; 909 (2)
- **The SAGA Survey. II. Building a Statistical Sample of Satellite Systems around Milky Way-like Galaxies** *ASTROPHYSICAL JOURNAL*
Mao, Y., Geha, M., Wechsler, R. H., Weiner, B., Tollerud, E. J., Nadler, E. O., Kallivayalil, N.
2021; 907 (2)
- **The Binary-Host Connection: Astrophysics of Gravitational-Wave Binaries from Host Galaxy Properties** *ASTROPHYSICAL JOURNAL*
Adhikari, S., Fishbach, M., Holz, D. E., Wechsler, R. H., Fang, Z.
2020; 905 (1)
- **Constraints on Dark Matter Microphysics from the Milky Way Satellite Population (vol 878, 32, 2019)** *ASTROPHYSICAL JOURNAL LETTERS*
Nadler, E. O., Gluscevic, V., Boddy, K. K., Wechsler, R. H.
2020; 897 (2)
- **UNIVERSEMACHINE: The correlation between galaxy growth and dark matter halo assembly from z=0-10** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Behroozi, P., Wechsler, R. H., Hearin, A. P., Conroy, C.
2019; 488 (3): 3143-94
- **The AEMULUS Project. I. Numerical Simulations for Precision Cosmology** *ASTROPHYSICAL JOURNAL*
DeRose, J., Wechsler, R. H., Tinker, J. L., Becker, M. R., Mao, Y., McClintock, T., McLaughlin, S., Rozo, E., Zhai, Z.
2019; 875 (1)
- **The Connection Between Galaxies and Their Dark Matter Halos** *ANNUAL REVIEW OF ASTRONOMY AND ASTROPHYSICS, VOL 56*
Wechsler, R. H., Tinker, J. L., Faber, S. M., VanDishoeck, E.
2018; 56: 435-87
- **THE CONCENTRATION DEPENDENCE OF THE GALAXY-HALO CONNECTION: MODELING ASSEMBLY BIAS WITH ABUNDANCE MATCHING** *ASTROPHYSICAL JOURNAL*
Lehmann, B. V., Mao, Y., Becker, M. R., Skillman, S. W., Wechsler, R. H.
2017; 834 (1)
- **DETECTION OF LENSING SUBSTRUCTURE USING ALMA OBSERVATIONS OF THE DUSTY GALAXY SDP. 81** *ASTROPHYSICAL JOURNAL*

- Hezaveh, Y. D., Dalal, N., Marrone, D. P., Mao, Y., Morningstar, W., Wen, D., Blandford, R. D., Carlstrom, J. E., Fassnacht, C. D., Holder, G. P., Kembball, A., Marshall, P. J., Murray, et al
2016; 823 (1)
- **CONNECTING GALAXIES, HALOS, AND STAR FORMATION RATES ACROSS COSMIC TIME** *ASTROPHYSICAL JOURNAL*
Conroy, C., Wechsler, R. H.
2009; 696 (1): 620-635
 - **The dependence of halo clustering on halo formation history, concentration, and occupation** *ASTROPHYSICAL JOURNAL*
Wechsler, R. H., Zentner, A. R., Bullock, J. S., Kravtsov, A. V., Allgood, B.
2006; 652 (1): 71-84
 - **Optical selection bias and projection effects in stacked galaxy cluster weak lensing** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Wu, H., Costanzi, M., To, C., Salcedo, A. N., Weinberg, D. H., Annis, J., Bocquet, S., Pereira, M., DeRose, J., Esteves, J., Farahi, A., Grandis, S., Rozo, et al
2022; 515 (3): 4471-4486
 - **The DESI N-body simulation project - I. Testing the robustness of simulations for the DESI dark time survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Grove, C., Chuang, C., Devi, N., Garrison, L., L'Huillier, B., Feng, Y., Helly, J., Hernandez-Aguayo, C., Alam, S., Zhang, H., Yu, Y., Cole, S., Eisenstein, et al
2022; 515 (2): 1854-1870
 - **Stringent sigma(8) constraints from small-scale galaxy clustering using a hybrid MCMC plus emulator framework** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Yuan, S., Garrison, L. H., Eisenstein, D. J., Wechsler, R. H.
2022; 515 (1): 871-896
 - **COMAP Early Science. I. Overview** *ASTROPHYSICAL JOURNAL*
Cleary, K. A., Borowska, J., Breyse, P. C., Catha, M., Chung, D. T., Church, S. E., Dickinson, C., Eriksen, H., Foss, M., Gundersen, J., Harper, S. E., Harris, A., Hobbs, et al
2022; 933 (2)
 - **Superclustering with the Atacama Cosmology Telescope and Dark Energy Survey. I. Evidence for Thermal Energy Anisotropy Using Oriented Stacking** *ASTROPHYSICAL JOURNAL*
Lokken, M., Hlozek, R., van Engelen, A., Madhavacheril, M., Baxter, E., DeRose, J., Doux, C., Pandey, S., Rykoff, E. S., Stein, G., To, C., Abbott, T. C., Adhikari, et al
2022; 933 (2)
 - **COMAP Early Science. V. Constraints and Forecasts at z similar to 3** *ASTROPHYSICAL JOURNAL*
Chung, D. T., Breyse, P. C., Cleary, K. A., Ihle, H. T., Padmanabhan, H., Silva, M. B., Bond, J., Borowska, J., Catha, M., Church, S. E., Dunne, D. A., Eriksen, H., Foss, et al
2022; 933 (2)
 - **Tidal disruption of solitons in self-interacting ultralight axion dark matter** *PHYSICAL REVIEW D*
Glennon, N., Nadler, E. O., Musoke, N., Banerjee, A., Prescod-Weinstein, C., Wechsler, R. H.
2022; 105 (12)
 - **Milky Way Satellite Census. IV. Constraints on Decaying Dark Matter from Observations of Milky Way Satellite Galaxies** *ASTROPHYSICAL JOURNAL*
Mau, S., Nadler, E. O., Wechsler, R. H., Drlica-Wagner, A., Bechtol, K., Green, G., Huterer, D., Li, T. S., Mao, Y., Martinez-Vazquez, C. E., McNanna, M., Mutlu-Pakdil, B., Pace, et al
2022; 932 (2)
 - **Early-type galaxy density profiles from IllustrisTNG - III. Effects on outer kinematic structure** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Wang, Y., Mao, S., Vogelsberger, M., Springel, V., Hernquist, L., Wechsler, R. H.
2022; 513 (4): 6134-6151
 - **Extending the SAGA Survey (xSAGA). I. Satellite Radial Profiles as a Function of Host-galaxy Properties** *ASTROPHYSICAL JOURNAL*
Wu, J. F., Peek, J. G., Tollerud, E. J., Mao, Y., Nadler, E. O., Geha, M., Wechsler, R. H., Kallivayalil, N., Weiner, B. J.
2022; 927 (1)
 - **Bounds on Velocity-dependent Dark Matter-Proton Scattering from Milky Way Satellite Abundance (vol 907, L46, 2021)** *ASTROPHYSICAL JOURNAL LETTERS*

- Maamari, K., Gluscevic, V., Boddy, K. K., Nadler, E. O., Wechsler, R. H.
2022; 928 (1)
- **Deep Realistic Extragalactic Model (DREaM) Galaxy Catalogs: Predictions for a Roman Ultra-deep Field** *ASTROPHYSICAL JOURNAL*
Drakos, N. E., Villaseñor, B., Robertson, B. E., Hausen, R., Dickinson, M. E., Ferguson, H. C., Furlanetto, S. R., Greene, J. E., Madau, P., Shapley, A. E., Stark, D. P., Wechsler, R. H.
2022; 926 (2)
 - **Optimization of the Observing Cadence for the Rubin Observatory Legacy Survey of Space and Time: A Pioneering Process of Community-focused Experimental Design** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Bianco, F. B., Ivezić, Z., Jones, R., Graham, M. L., Marshall, P., Saha, A., Strauss, M. A., Yoachim, P., Ribeiro, T., Anguita, T., Bauer, A. E., Bauer, F. E., Bellm, et al
2022; 258 (1)
 - **Line confusion in spectroscopic surveys and its possible effects: shifts in Baryon Acoustic Oscillations position** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Massara, E., Ho, S., Hirata, C. M., DeRose, J., Wechsler, R. H., Fang, X.
2021; 508 (3): 4193-4201
 - **Probing Galaxy Evolution in Massive Clusters Using ACT and DES: Splashback as a Cosmic Clock** *ASTROPHYSICAL JOURNAL*
Adhikari, S., Shin, T., Jain, B., Hilton, M., Baxter, E., Chang, C., Wechsler, R. H., Battaglia, N., Bond, J., Bocquet, S., Choi, S. K., DeRose, J., Devlin, et al
2021; 923 (1)
 - **Simultaneous Estimation of Large-scale Structure and Milky Way Dust Extinction from Galaxy Surveys** *ASTROPHYSICAL JOURNAL*
Bravo, M., Gawiser, E., Padilla, N. D., DeRose, J., Wechsler, R. H., LSST Dark Energy Sci Collaboration
2021; 921 (2)
 - **The Effects of Dark Matter and Baryonic Physics on the Milky Way Subhalo Population in the Presence of the Large Magellanic Cloud** *ASTROPHYSICAL JOURNAL LETTERS*
Nadler, E. O., Banerjee, A., Adhikari, S., Mao, Y., Wechsler, R. H.
2021; 920 (1)
 - **The DECam Local Volume Exploration Survey: Overview and First Data Release** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Drlica-Wagner, A., Carlin, J. L., Nidever, D. L., Ferguson, P. S., Kuropatkin, N., Adamow, M., Cerny, W., Choi, Y., Esteves, J. H., Martinez-Vazquez, C. E., Mau, S., Miller, A. E., Mutlu-Pakdil, et al
2021; 256 (1)
 - **The Dark Energy Survey Data Release 2** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Abbott, T. C., Adamow, M., Aguena, M., Allam, S., Amon, A., Annis, J., Avila, S., Bacon, D., Banerji, M., Bechtol, K., Becker, M. R., Bernstein, G. M., Bertin, et al
2021; 255 (2)
 - **Probing the galaxy-halo connection with total satellite luminosity** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Tinker, J. L., Cao, J., Alpaslan, M., DeRose, J., Mao, Y., Wechsler, R. H.
2021; 505 (4): 5370-5388
 - **Dark Energy Survey Year 3 Results: Photometric Data Set for Cosmology** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Sevilla-Noarbe, Bechtol, K., Kind, M., Rosell, A., Becker, M. R., Drlica-Wagner, A., Gruendl, R. A., Rykoff, E. S., Sheldon, E., Yanny, B., Alarcon, A., Allam, S., Amon, A., et al
2021; 254 (2)
 - **The HST See Change Program. I. Survey Design, Pipeline, and Supernova Discoveries*** *ASTROPHYSICAL JOURNAL*
Hayden, B., Rubin, D., Boone, K., Aldering, G., Nordin, J., Brodwin, M., Deustua, S., Dixon, S., Fagreluis, P., Fruchter, A., Eisenhardt, P., Gonzalez, A., Gupta, et al
2021; 912 (2)
 - **Mock light-cones and theory friendly catalogues for the CANDELS survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Somerville, R. S., Olsen, C., Yung, L., Pacifici, C., Ferguson, H. C., Behroozi, P., Osborne, S., Wechsler, R. H., Pandya, V., Faber, S. M., Primack, J. R., Dekel, A.
2021; 502 (4): 4858-76
 - **Combination of cluster number counts and two-point correlations: validation on mock Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*

To, C., Krause, E., Rozo, E., Wu, H., Gruen, D., DeRose, J., Rykoff, E., Wechsler, R. H., Becker, M., Costanzi, M., Eifler, T., Pereira, M., Kokron, et al
2021; 502 (3): 4093-4111

- **Bounds on Velocity-dependent Dark Matter-Proton Scattering from Milky Way Satellite Abundance** *ASTROPHYSICAL JOURNAL LETTERS*
Maamari, K., Gluscevic, V., Boddy, K. K., Nadler, E. O., Wechsler, R. H.
2021; 907 (2)
- **Illuminating dark matter halo density profiles without subhaloes** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Fielder, C. E., Mao, Y., Zentner, A. R., Newman, J. A., Wu, H., Wechsler, R. H.
2020; 499 (2): 2426-44
- **The Universe at $z > 10$: predictions for JWST from the UNIVERSEMACHINE DR1** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Behroozi, P., Conroy, C., Wechsler, R. H., Hearin, A., Williams, C. C., Moster, B. P., Yung, L., Somerville, R. S., Gottlober, S., Yepes, G., Endsley, R.
2020; 499 (4): 5702-18
- **Constraining the scatter in the galaxy-halo connection at Milky Way masses** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Cao, J., Tinker, J. L., Mao, Y., Wechsler, R. H.
2020; 498 (4): 5080-92
- **Concentrations of dark haloes emerge from their merger histories** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Wang, K., Mao, Y., Zentner, A. R., Lange, J. U., van den Bosch, F. C., Wechsler, R. H.
2020; 498 (3): 4450-64
- **RedMaPPer: Evolution and Mass Dependence of the Conditional Luminosity Functions of Red Galaxies in Galaxy Clusters** *ASTROPHYSICAL JOURNAL*
To, C., Reddick, R. M., Rozo, E., Rykoff, E., Wechsler, R. H.
2020; 897 (1)
- **Signatures of Velocity-dependent Dark Matter Self-interactions in Milky Way-mass Halos** *ASTROPHYSICAL JOURNAL*
Nadler, E. O., Banerjee, A., Adhikari, S., Mao, Y., Wechsler, R. H.
2020; 896 (2)
- **The impact of the fiducial cosmology assumption on BAO distance scale measurements** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Carter, P., Beutler, F., Percival, W. J., DeRose, J., Wechsler, R. H., Zhao, C.
2020; 494 (2): 2076-89
- **Forecasting [C ii] Line-intensity Mapping Measurements between the End of Reionization and the Epoch of Galaxy Assembly** *ASTROPHYSICAL JOURNAL*
Chung, D. T., Viero, M. P., Church, S. E., Wechsler, R. H.
2020; 892 (1)
- **CosmoDC2: A Synthetic Sky Catalog for Dark Energy Science with LSST** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Korytov, D., Hearin, A., Kovacs, E., Larsen, P., Rangel, E., Hollowed, J., Benson, A. J., Heitmann, K., Mao, Y., Bahmanyar, A., Chang, C., Campbell, D., DeRose, et al
2019; 245 (2)
- **Data-driven Reconstruction of Gravitationally Lensed Galaxies Using Recurrent Inference Machines** *ASTROPHYSICAL JOURNAL*
Morningstar, W. R., Levasseur, L., Hezaveh, Y. D., Blandford, R., Marshall, P., Putzky, P., Rueter, T. D., Wechsler, R., Welling, M.
2019; 883 (1)
- **Hierarchical Modeling and Statistical Calibration for Photometric Redshifts** *ASTROPHYSICAL JOURNAL*
Leistedt, B., Hogg, D. W., Wechsler, R. H., DeRose, J.
2019; 881 (1)
- **UNIT project: Universe N-body simulations for the Investigation of Theoretical models from galaxy surveys** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Chuang, C., Yepes, G., Kitaura, F., Pellejero-Ibanez, M., Rodriguez-Torres, S., Feng, Y., Metcalf, R., Wechsler, R. H., Zhao, C., To, C., Alam, S., Banerjee, A., DeRose, et al
2019; 487 (1): 48-59
- **Galaxy formation and evolution science in the era of the Large Synoptic Survey Telescope** *NATURE REVIEWS PHYSICS*
Robertson, B. E., Banerji, M., Brough, S., Davies, R. L., Ferguson, H. C., Hausen, R., Kaviraj, S., Newman, J. A., Schmidt, S. J., Tyson, J., Wechsler, R. H.

2019; 1 (7): 450–62

- **Constraints on Dark Matter Microphysics from the Milky Way Satellite Population** *ASTROPHYSICAL JOURNAL LETTERS*
Nadler, E. O., Gluscevic, V., Boddy, K. K., Wechsler, R. H.
2019; 878 (2)
- **Overview of the DESI Legacy Imaging Surveys** *ASTRONOMICAL JOURNAL*
Dey, A., Schlegel, D. J., Lang, D., Blum, R., Burleigh, K., Fan, X., Findlay, J. R., Finkbeiner, D., Herrera, D., Juneau, S., Landriau, M., Levi, M., McGreer, et al
2019; 157 (5)
- **Effects of [N II] and H alpha line blending on the WFIRST Galaxy redshift survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Martens, D., Fang, X., Troxel, M. A., DeRose, J., Hirata, C. M., Wechsler, R. H., Wang, Y.
2019; 485 (1): 211–28
- **ATLAS probe: Breakthrough science of galaxy evolution, cosmology, Milky Way, and the Solar System** *PUBLICATIONS OF THE ASTRONOMICAL SOCIETY OF AUSTRALIA*
Wang, Y., Robberto, M., Dickinson, M., Hillenbrand, L. A., Fraser, W., Behroozi, P., Brinchmann, J., Chuang, C., Cimatti, A., Content, R., Daddi, E., Ferguson, H. C., Hirata, et al
2019; 36
- **The Aemulus Project. III. Emulation of the Galaxy Correlation Function** *ASTROPHYSICAL JOURNAL*
Zhai, Z., Tinker, J. L., Becker, M. R., DeRose, J., Mao, Y., McClintock, T., McLaughlin, S., Rozzo, E., Wechsler, R. H.
2019; 874 (1)
- **Modeling the Connection between Subhalos and Satellites in Milky Way-like Systems** *ASTROPHYSICAL JOURNAL*
Nadler, E. O., Mao, Y., Green, G. M., Wechsler, R. H.
2019; 873 (1)
- **Correcting for fibre assignment incompleteness in the DESI Bright Galaxy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Smith, A., He, J., Cole, S., Stothert, L., Norberg, P., Baugh, C., Bianchi, D., Wilson, M. J., Brooks, D., Forero-Romero, J. E., Moustakas, J., Percival, W. J., Tarle, et al
2019; 484 (1): 1285–1300
- **Cross-correlating Carbon Monoxide Line-intensity Maps with Spectroscopic and Photometric Galaxy Surveys** *ASTROPHYSICAL JOURNAL*
Chung, D. T., Viero, M. P., Church, S. E., Wechsler, R. H., Alvarez, M. A., Bond, J., Breyse, P. C., Cleary, K. A., Eriksen, H. K., Foss, M. K., Gundersen, J. O., Harper, S. E., Ihle, et al
2019; 872 (2)
- **The Aemulus Project. II. Emulating the Halo Mass Function** *ASTROPHYSICAL JOURNAL*
McClintock, T., Rozo, E., Becker, M. R., DeRose, J., Mao, Y., McLaughlin, S., Tinker, J. L., Wechsler, R. H., Zhai, Z.
2019; 872 (1)
- **Weak Lensing Measurement of the Mass-Richness Relation of SDSS redMaPPer Clusters (vol 466, pg 3103, 2017)** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Simet, M., McClintock, T., Mandelbaum, R., Rozo, E., Rykoff, E., Sheldon, E., Wechsler, R. H.
2018; 480 (4): 5385
- **Modeling the Impact of Baryons on Subhalo Populations with Machine Learning** *ASTROPHYSICAL JOURNAL*
Nadler, E. O., Mao, Y., Wechsler, R. H., Garrison-Kimmel, S., Wetzel, A.
2018; 859 (2)
- **Spatial clustering of dark matter haloes: secondary bias, neighbour bias, and the influence of massive neighbours on halo properties** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Salcedo, A. N., Maller, A. H., Berlind, A. A., Sinha, M., McBride, C. K., Behroozi, P. S., Wechsler, R. H., Weinberg, D. H.
2018; 475 (4): 4411–23
- **Mapping extragalactic dark matter annihilation with galaxy surveys: A systematic study of stacked group searches** *PHYSICAL REVIEW D*
Lisanti, M., Mishra-Sharma, S., Rodd, N. L., Safdi, B. R., Wechsler, R. H.
2018; 97 (6)
- **Beyond assembly bias: exploring secondary halo biases for cluster-size haloes** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*

- Mao, Y., Zentner, A. R., Wechsler, R. H.
2018; 474 (4): 5143–57
- **DESCQA: An Automated Validation Framework for Synthetic Sky Catalogs** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Mao, Y., Kovacs, E., Heitmann, K., Uram, T. D., Benson, A. J., Campbell, D., Cora, S. A., DeRose, J., Di Matteo, T., Habib, S., Hearin, A. P., Kalmbach, J., Krughoff, et al
2018; 234 (2)
 - **Overview of the Dark Energy Spectroscopic Instrument**
Martini, P., Bailey, S., Besuner, R. W., Brooks, D., Doel, P., Edelman, J., Eisenstein, D., Flaugher, B., Gutierrez, G., Harris, S. E., Honscheid, K., Jelinsky, P., Joyce, et al
SPIE-INT SOC OPTICAL ENGINEERING.2018
 - **Weak lensing measurement of the mass-richness relation of SDSS redMaPPer clusters** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Simet, M., McClintock, T., Mandelbaum, R., Rozo, E., Rykoff, E., Sheldon, E., Wechsler, R. H.
2017; 466 (3): 3103-3118
 - **Farthest Neighbor: The Distant Milky Way Satellite Eridanus II** *ASTROPHYSICAL JOURNAL*
Li, T. S., Simon, J. D., Drlica-Wagner, A., Bechtol, K., Wang, M. Y., Garcia-Bellido, J., Frieman, J., MARSHALL, J. L., James, D. J., Strigari, L., Pace, A. B., Balbinot, E., Zhang, et al
2017; 838 (1)
 - **Inference from the small scales of cosmic shear with current and future Dark Energy Survey data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
MacCrann, N., Aleksic, J., Amara, A., Bridle, S. L., Bruderer, C., Chang, C., Dodelson, S., Eifler, T. F., Huff, E. M., Huterer, D., Kacprzak, T., Refregier, A., Suchyta, et al
2017; 465 (3): 2567-2583
 - **Galaxy-galaxy lensing in the Dark Energy Survey Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Clampitt, J., Sanchez, C., Kwan, J., Krause, E., MacCrann, N., Park, Y., Troxel, M. A., Jain, B., Rozo, E., Rykoff, E. S., Wechsler, R. H., Blazek, J., Bonnett, et al
2017; 465 (4): 4204-4218
 - **Cosmic voids and void lensing in the Dark Energy Survey Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Sanchez, C., Clampitt, J., Kovacs, A., Jain, B., Garcia-Bellido, J., Nadathur, S., Gruen, D., Hamaus, N., Huterer, D., Vielzeuf, P., Amara, A., Bonnett, C., DeRose, et al
2017; 465 (1): 746-759
 - **Cosmology from large-scale galaxy clustering and galaxy-galaxy lensing with Dark Energy Survey Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Kwan, J., Sanchez, C., Clampitt, J., Blazek, J., Crocce, M., Jain, B., Zuntz, J., Amara, A., Becker, M. R., Bernstein, G. M., Bonnett, C., DeRose, J., Dodelson, et al
2017; 464 (4): 4045-4062
 - **SEARCHING FOR DARK MATTER ANNIHILATION IN RECENTLY DISCOVERED MILKY WAY SATELLITES WITH FERMI-LAT** *ASTROPHYSICAL JOURNAL*
Albert, A., Anderson, B., Bechtol, K., Drlica-Wagner, A., Meyer, M., Sanchez-Conde, M., Strigari, L., Wood, M., Abbott, T. M., Abdalla, F. B., Benoit-Levy, A., Bernstein, G. M., Bernstein, et al
2017; 834 (2)
 - **AN ULTRA-FAINT GALAXY CANDIDATE DISCOVERED IN EARLY DATA FROM THE MAGELLANIC SATELLITES SURVEY** *ASTROPHYSICAL JOURNAL LETTERS*
Drlica-Wagner, A., Bechtol, K., Allam, S., Tucker, D. L., Gruendl, R. A., Johnson, M. D., Walker, A. R., James, D. J., Nidever, D. L., Olsen, K. A., Wechsler, R. H., Cioni, M. R., Conn, et al
2016; 833 (1)
 - **Cosmic shear as a probe of galaxy formation physics** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Foreman, S., Becker, M. R., Wechsler, R. H.
2016; 463 (3): 3326-3338
 - **Constraining the mass-richness relationship of redMaPPer clusters with angular clustering** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Baxter, E. J., Rozo, E., Jain, B., Rykoff, E., Wechsler, R. H.

2016; 463 (1): 205-221

- **THE CONNECTION BETWEEN THE HOST HALO AND THE SATELLITE GALAXIES OF THE MILKY WAY** *ASTROPHYSICAL JOURNAL*
Lu, Y., Benson, A., Mao, Y., Tonnesen, S., Peter, A. H., Wetzel, A. R., Boylan-Kolchin, M., Wechsler, R. H.
2016; 830 (2)
- **Joint measurement of lensing-galaxy correlations using SPT and DES SV data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Baxter, E., Clampitt, J., Giannantonio, T., Dodelson, S., Jain, B., Huterer, D., Bleem, L., Crawford, T., Efstathiou, G., Fosalba, P., Kirk, D., Kwan, J., Sanchez, et al
2016; 461 (4): 4099-4114
- **MAPPING AND SIMULATING SYSTEMATICS DUE TO SPATIALLY VARYING OBSERVING CONDITIONS IN DES SCIENCE VERIFICATION DATA** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Leistedt, B., Peiris, H. V., Elsner, F., Benoit-Levy, A., Amara, A., BAUER, A. H., Becker, M. R., Bonnett, C., Bruderer, C., Busha, M. T., Kind, M. C., Chang, C., Crocce, et al
2016; 226 (2)
- **Joint analysis of galaxy-galaxy lensing and galaxy clustering: Methodology and forecasts for Dark Energy Survey** *PHYSICAL REVIEW D*
Park, Y., Krause, E., Dodelson, S., Jain, B., Amara, A., Becker, M. R., Bridle, S. L., Clampitt, J., Crocce, M., Fosalba, P., Gaztanaga, E., Honscheid, K., Rozo, et al
2016; 94 (6)
- **redMaGiC: selecting luminous red galaxies from the DES Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Roza, E., Rykoff, E. S., Abate, A., Bonnett, C., Crocce, M., Davis, C., Hoyle, B., Leistedt, B., Peiris, H. V., Wechsler, R. H., Abbott, T., Abdalla, F. B., Banerji, et al
2016; 461 (2): 1431-1450
- **Redshift distributions of galaxies in the Dark Energy Survey Science Verification shear catalogue and implications for weak lensing** *PHYSICAL REVIEW D*
Bonnett, C., Troxel, M. A., Hartley, W., Amara, A., Leistedt, B., Becker, M. R., Bernstein, G. M., Bridle, S. L., Bruderer, C., Busha, M. T., Kind, M. C., Childress, M. J., Castander, et al
2016; 94 (4)
- **Galaxy cluster mass estimation from stacked spectroscopic analysis** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Farahi, A., Evrard, A. E., Roza, E., Rykoff, E. S., Wechsler, R. H.
2016; 460 (4): 3900-3912
- **The Dark Energy Survey: more than dark energy - an overview** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Abbott, T., Abdalla, F. B., Aleksic, J., Allam, S., Amara, A., Bacon, D., Balbinot, E., Banerji, M., Bechtol, K., Benoit-Levy, A., Bernstein, G. M., Bertin, E., Blazek, et al
2016; 460 (2): 1270-1299
- **The DES Science Verification weak lensing shear catalogues** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Jarvis, M., Sheldon, E., Zuntz, J., Kacprzak, T., Bridle, S. L., Amara, A., Armstrong, R., Becker, M. R., Bernstein, G. M., Bonnett, C., Chang, C., Das, R., Dietrich, et al
2016; 460 (2): 2245-2281
- **LOCALIZATION AND BROADBAND FOLLOW-UP OF THE GRAVITATIONAL-WAVE TRANSIENT GW 150914** *ASTROPHYSICAL JOURNAL LETTERS*
Abbott, B. P., Abbott, R., Abbott, T. D., ABERNATHY, M. R., Acernese, F., Ackley, K., Adams, C., Adams, T., Addesso, P., Adhikari, R. X., Adya, V. B., Affeldt, C., Agathos, et al
2016; 826 (1)
- **Rhapsody-G simulations - II. Baryonic growth and metal enrichment in massive galaxy clusters** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Martizzi, D., Hahn, O., Wu, H., Evrard, A. E., Teyssier, R., Wechsler, R. H.
2016; 459 (4): 4408-4427
- **Cosmology from cosmic shear with Dark Energy Survey Science Verification data** *PHYSICAL REVIEW D*
Abbott, T., Abdalla, F. B., Allam, S., Amara, A., Annis, J., Armstrong, R., Bacon, D., Banerji, M., BAUER, A. H., Baxter, E., Becker, M. R., Benoit-Levy, A., Bernstein, et al
2016; 94 (2)
- **Cosmic shear measurements with Dark Energy Survey Science Verification data** *PHYSICAL REVIEW D*

- Becker, M. R., Troxel, M. A., Maccrann, N., Krause, E., Eifler, T. F., Friedrich, O., Nicola, A., Refregier, A., Amara, A., Bacon, D., Bernstein, G. M., Bonnett, C., Bridle, et al
2016; 94 (2)
- **SUPPLEMENT: "LOCALIZATION AND BROADBAND FOLLOW-UP OF THE GRAVITATIONAL-WAVE TRANSIENT GW150914" (2016, ApJL, 826, L13) ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES**
Abbott, B. P., Abbott, R., Abbott, T. D., ABERNATHY, M. R., Acernese, F., Ackley, K., Adams, C., Adams, T., Addesso, P., Adhikari, R. X., Adya, V. B., Affeldt, C., Agathos, et al
2016; 225 (1)
 - **Cross-correlation of gravitational lensing from DES Science Verification data with SPT and Planck lensing MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY**
Kirk, D., Omori, Y., Benoit-Levy, A., Cawthon, R., Chang, C., Larsen, P., Amara, A., Bacon, D., Crawford, T. M., Dodelson, S., Fosalba, P., Giannantonio, T., Holder, et al
2016; 459 (1): 21-34
 - **A DARK ENERGY CAMERA SEARCH FOR AN OPTICAL COUNTERPART TO THE FIRST ADVANCED LIGO GRAVITATIONAL WAVE EVENT GW150914 ASTROPHYSICAL JOURNAL LETTERS**
Soares-Santos, M., Kessler, R., Berger, E., Annis, J., BROUT, D., Buckley-Geer, E., Chen, H., Cowperthwaite, P. S., Diehl, H. T., Doctor, Z., Drlica-Wagner, A., FARR, B., Finley, et al
2016; 823 (2)
 - **THE SPITZER-HETDEX EXPLORATORY LARGE-AREA SURVEY ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES**
Papovich, C., Shipley, H. V., Mehrtens, N., Lanham, C., Lacy, M., Ciardullo, R., Finkelstein, S. L., Bassett, R., Behroozi, P., Blanc, G. A., de Jong, R. S., DePoy, D. L., Drory, et al
2016; 224 (2)
 - **A DARK ENERGY CAMERA SEARCH FOR MISSING SUPERGIANTS IN THE LMC AFTER THE ADVANCED LIGO GRAVITATIONAL-WAVE EVENT GW150914 ASTROPHYSICAL JOURNAL LETTERS**
Annis, J., Soares-Santos, M., Berger, E., BROUT, D., Chen, H., Chornock, R., Cowperthwaite, P. S., Diehl, H. T., Doctor, Z., Drlica-Wagner, A., Drout, M. R., FARR, B., Finley, et al
2016; 823 (2)
 - **THE REDMAPPER GALAXY CLUSTER CATALOG FROM DES SCIENCE VERIFICATION DATA ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES**
Rykoff, E. S., Rozo, E., HOLLOWOOD, D., Bermeo-Hernandez, A., Jeltema, T., Mayers, J., Romer, A. K., Rooney, P., Saro, A., Cervantes, C. V., Wechsler, R. H., Wilcox, H., Abbott, et al
2016; 224 (1)
 - **THE EATING HABITS OF MILKY WAY-MASS HALOS: DESTROYED DWARF SATELLITES AND THE METALLICITY DISTRIBUTION OF ACCRETED STARS ASTROPHYSICAL JOURNAL**
Deason, A. J., Mao, Y., Wechsler, R. H.
2016; 821 (1)
 - **SPOKES: An end-to-end simulation facility for spectroscopic cosmological surveys ASTRONOMY AND COMPUTING**
Nord, B., Amara, A., Refregier, A., Gamper, L., Gamper, L., Hambrecht, B., Chang, C., Forero-Romero, J. E., Serrano, S., Cunha, C., COLES, O., Nicola, A., Busha, et al
2016; 15: 1-15
 - **No galaxy left behind: accurate measurements with the faintest objects in the Dark Energy Survey MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY**
Suchyta, E., Huff, E. M., Aleksic, J., Melchior, P., Jouvel, S., Maccrann, N., Ross, A. J., Crocce, M., Gaztanaga, E., Honscheid, K., Leistedt, B., Peiris, H. V., Rykoff, et al
2016; 457 (1): 786-808
 - **Disentangling redshift-space distortions and non-linear bias using the 2D power spectrum MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY**
Jennings, E., Wechsler, R. H., Skillman, S. W., Warren, M. S.
2016; 457 (1): 1076-1088
 - **CMB lensing tomography with the DES Science Verification galaxies MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY**

- Giannantonio, T., Fosalba, P., Cawthon, R., Omori, Y., Crocce, M., Elsner, F., Leistedt, B., Dodelson, S., Benoit-Levy, A., Gaztanaga, E., Holder, G., Peiris, H. V., Percival, et al
2016; 456 (3): 3213-3244
- **CONNECTING CO INTENSITY MAPPING TO MOLECULAR GAS AND STAR FORMATION IN THE EPOCH OF GALAXY ASSEMBLY** *ASTROPHYSICAL JOURNAL*
Li, T. Y., Wechsler, R. H., Devaraj, K., Church, S. E.
2016; 817 (2)
 - **Galaxy clustering, photometric redshifts and diagnosis of systematics in the DES Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Crocce, M., Carretero, J., BAUER, A. H., Ross, A. J., Sevilla-Noarbe, I., Giannantonio, T., Sobreira, F., Sanchez, J., Gaztanaga, E., Kind, M. C., Sanchez, C., Bonnett, C., Benoit-Levy, et al
2016; 455 (4): 4301-4324
 - **Weak lensing by galaxy troughs in DES Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Gruen, D., Friedrich, O., Amara, A., Bacon, D., Bonnett, C., Hartley, W., Jain, B., Jarvis, M., Kacprzak, T., Krause, E., Mana, A., Rozo, E., Rykoff, et al
2016; 455 (3): 3367-3380
 - **DES J0454-4448: discovery of the first luminous $z \geq 6$ quasar from the Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Reed, S. L., McMahon, R. G., Banerji, M., Becker, G. D., Gonzalez-Solares, E., Martini, P., Ostrovski, F., Rauch, M., Abbott, T., Abdalla, F. B., Allam, S., Benoit-Levy, A., Bertin, et al
2015; 454 (4): 3952-3961
 - **Constraints on the richness-mass relation and the optical-SZE positional offset distribution for SZE-selected clusters** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Saro, A., Bocquet, S., Rozo, E., Benson, B. A., Mohr, J., Rykoff, E. S., Soares-Santos, M., Bleem, L., Dodelson, S., Melchior, P., Sobreira, F., Upadhyay, V., Weller, et al
2015; 454 (3): 2305-2319
 - **Discovery of two gravitationally lensed quasars in the Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Agnello, A., Treu, T., Ostrovski, F., Schechter, P. L., Buckley-Geer, E. J., Lin, H., Auger, M. W., Courbin, F., Fassnacht, C. D., Frieman, J., Kuropatkin, N., Marshall, P. J., McMahon, et al
2015; 454 (2): 1260-1265
 - **EIGHT ULTRA-FAINT GALAXY CANDIDATES DISCOVERED IN YEAR TWO OF THE DARK ENERGY SURVEY** *ASTROPHYSICAL JOURNAL*
Drica-Wagner, A., Bechtol, K., Rykoff, E. S., Luque, E., Queiroz, A., Mao, Y., Wechsler, R. H., Simon, J. D., Santiago, B., Yanny, B., Balbinot, E., Dodelson, S., Neto, et al
2015; 813 (2)
 - **redMaPPer - IV. Photometric membership identification of red cluster galaxies with 1 per cent precision** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Roza, E., Rykoff, E. S., Becker, M., Reddick, R. M., Wechsler, R. H.
2015; 453 (1): 38-52
 - **OzDES multifibre spectroscopy for the Dark Energy Survey: first-year operation and results** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Yuan, F., Lidman, C., Davis, T. M., Childress, M., Abdalla, F. B., Banerji, M., Buckley-Geer, E., Carnero Rosell, A., Carollo, D., Castander, F. J., D'Andrea, C. B., Diehl, H. T., Cunha, et al
2015; 452 (3): 3047-3063
 - **RHAPSODY-G simulations: galaxy clusters as baryonic closed boxes and the covariance between hot gas and galaxies** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Wu, H., Evrard, A. E., Hahn, O., Martizzi, D., Teyssier, R., Wechsler, R. H.
2015; 452 (2): 1982-1991
 - **THE DEPENDENCE OF SUBHALO ABUNDANCE ON HALO CONCENTRATION** *ASTROPHYSICAL JOURNAL*
Mao, Y., Williamson, M., Wechsler, R. H.
2015; 810 (1)

- **SEARCH FOR GAMMA-RAY EMISSION FROM DES DWARF SPHEROIDAL GALAXY CANDIDATES WITH FERMI-LAT DATA** *ASTROPHYSICAL JOURNAL LETTERS*
Drlica-Wagner, A., Albert, A., Bechtol, K., Wood, M., Strigari, L., Sanchez-Conde, M., Baldini, L., Essig, R., Cohen-Tanugi, J., Anderson, B., Bellazzini, R., Bloom, E. D., Caputo, et al
2015; 809 (1)
- **Wide-Field Lensing Mass Maps from Dark Energy Survey Science Verification Data.** *Physical review letters*
Chang, C., Vikram, V., Jain, B., Bacon, D., Amara, A., Becker, M. R., Bernstein, G., Bonnett, C., Bridle, S., BROUT, D., Busha, M., Frieman, J., Gaztanaga, et al
2015; 115 (5): 051301-?
- **Wide-field lensing mass maps from Dark Energy Survey science verification data: Methodology and detailed analysis** *PHYSICAL REVIEW D*
Vikram, V., Chang, C., Jain, B., Bacon, D., Amara, A., Becker, M. R., Bernstein, G., Bonnett, C., Bridle, S., BROUT, D., Busha, M., Frieman, J., Gaztanaga, et al
2015; 92 (2)
- **Wide-Field Lensing Mass Maps from Dark Energy Survey Science Verification Data** *PHYSICAL REVIEW LETTERS*
Chang, C., Vikram, V., Jain, B., Bacon, D., Amara, A., Becker, M. R., Bernstein, G., Bonnett, C., Bridle, S., BROUT, D., Busha, M., Frieman, J., Gaztanaga, et al
2015; 115 (5)
- **STELLAR KINEMATICS AND METALLICITIES IN THE ULTRA-FAINT DWARF GALAXY RETICULUM II** *ASTROPHYSICAL JOURNAL*
Simon, J. D., Drlica-Wagner, A., Li, T. S., Nord, B., Geha, M., Bechtol, K., Balbinot, E., Buckley-Geer, E., Lin, H., Marshall, J., Santiago, B., Strigari, L., Wang, et al
2015; 808 (1)
- **A CRITICAL ASSESSMENT OF STELLAR MASS MEASUREMENT METHODS** *ASTROPHYSICAL JOURNAL*
Mobasher, B., Dahlen, T., Ferguson, H. C., Acquaviva, V., Barro, G., Finkelstein, S. L., Fontana, A., Gruetzbauch, R., Johnson, S., Lu, Y., Papovich, C. J., Pforr, J., Salvato, et al
2015; 808 (1)
- **EIGHT NEW MILKY WAY COMPANIONS DISCOVERED IN FIRST-YEAR DARK ENERGY SURVEY DATA** *ASTROPHYSICAL JOURNAL*
Bechtol, K., Drlica-Wagner, A., Balbinot, E., Pieres, A., Simon, J. D., Yanny, B., Santiago, B., Wechsler, R. H., Frieman, J., Walker, A. R., Williams, P., Rozo, E., Rykoff, et al
2015; 807 (1)
- **Star/galaxy separation at faint magnitudes: application to a simulated Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Soumagnac, M. T., Abdalla, F. B., Lahav, O., Kirk, D., Sevilla, I., Bertin, E., Rowe, B. T., Annis, J., Busha, M. T., da Costa, L. N., Frieman, J. A., Gaztanaga, E., Jarvis, et al
2015; 450 (1): 666-680
- **Mass and galaxy distributions of four massive galaxy clusters from Dark Energy Survey Science Verification data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Melchior, P., Suchyta, E., Huff, E., Hirsch, M., Kacprzak, T., Rykoff, E., Gruen, D., Armstrong, R., Bacon, D., Bechtol, K., Bernstein, G. M., Bridle, S., Clampitt, et al
2015; 449 (3): 2219-2238
- **DES13S2cmm: the first superluminous supernova from the Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Papadopoulos, A., D'Andrea, C. B., Sullivan, M., Nichol, R. C., Barbary, K., Biswas, R., Brown, P. J., Covarrubias, R. A., Finley, D. A., Fischer, J. A., Foley, R. J., Goldstein, D., Gupta, et al
2015; 449 (2): 1215-1227
- **The LMC geometry and outer stellar populations from early DES data** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Balbinot, E., Santiago, B. X., Girardi, L., Pieres, A., da Costa, L. N., Maia, M. A., Gruendl, R. A., Walker, A. R., Yanny, B., Drlica-Wagner, A., Benoit-Levy, A., Abbott, T. M., Allam, et al
2015; 449 (1): 1129-1145
- **Spectroscopic needs for imaging dark energy experiments** *ASTROPARTICLE PHYSICS*
Newman, J. A., Abate, A., Abdalla, F. B., Allam, S., Allen, S. W., Ansar, R., Baile, S., Barkhouse, W. A., Beers, T. C., Blanton, M. R., Brodwin, M., Brownstein, J. R., Brunner, et al
2015; 63: 81-100
- **MODELING THE TRANSFER FUNCTION FOR THE DARK ENERGY SURVEY** *ASTROPHYSICAL JOURNAL*

-
- Chang, C., Busha, M. T., Wechsler, R. H., Refregier, A., Amara, A., Rykoff, E., Becker, M. R., Bruderer, C., Gamper, L., Leistedt, B., Peiris, H., Abbott, T., Abdalla, et al
2015; 801 (2)
- **THE RELATION BETWEEN STAR FORMATION RATE AND STELLAR MASS FOR GALAXIES AT $3.5 \leq z \leq 6.5$ IN CANDELS** *ASTROPHYSICAL JOURNAL*
Salmon, B., Papovich, C., Finkelstein, S. L., Tilvi, V., Finlator, K., Behroozi, P., Dahlen, T., Dave, R., Dekel, A., Dickinson, M., Ferguson, H. C., Giavalisco, M., Long, et al
2015; 799 (2)
 - **Combining Dark Energy Survey Science Verification data with near-infrared data from the ESO VISTA Hemisphere Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Banerji, M., Jouvel, S., Lin, H., McMahon, R. G., Lahav, O., Castander, F. J., Abdalla, F. B., Bertin, E., Bosman, S. E., Carnero, A., Kind, M. C., da Costa, L. N., Gerdes, et al
2015; 446 (3): 2523-2539
 - **Formation of disc galaxies in preheated media: a preventative feedback model** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Lu, Y., Mo, H. J., Wechsler, R. H.
2015; 446 (2): 1907-1923
 - **A NEW REDUCTION OF THE BLANCO COSMOLOGY SURVEY: AN OPTICALLY SELECTED GALAXY CLUSTER CATALOG AND A PUBLIC RELEASE OF OPTICAL DATA PRODUCTS** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Bleem, L. E., Stalder, B., Brodwin, M., Busha, M. T., Gladders, M. D., High, F. W., Rest, A., Wechsler, R. H.
2015; 216 (1)
 - **SEMI-ANALYTIC MODELS FOR THE CANDELS SURVEY: COMPARISON OF PREDICTIONS FOR INTRINSIC GALAXY PROPERTIES** *ASTROPHYSICAL JOURNAL*
Lu, Y., Wechsler, R. H., Somerville, R. S., Croton, D., Porter, L., Primack, J., Behroozi, P. S., Ferguson, H. C., Koo, D. C., Guo, Y., Safarzadeh, M., Finlator, K., Castellano, et al
2014; 795 (2)
 - **Spectroscopic failures in photometric redshift calibration: cosmological biases and survey requirements** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Cunha, C. E., Huterer, D., Lin, H., Busha, M. T., Wechsler, R. H.
2014; 444 (1): 129-146
 - **Orientation bias of optically selected galaxy clusters and its impact on stacked weak-lensing analyses** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Dietrich, J. P., Zhang, Y., Song, J., Davis, C. P., McKay, T. A., Baruah, L., Becker, M., Benoist, C., Busha, M., da Costa, L. A., Hao, J., Maia, M. A., Miller, et al
2014; 443 (2): 1713-1722
 - **MERGERS AND MASS ACCRETION FOR INFALLING HALOS BOTH END WELL OUTSIDE CLUSTER VIRIAL RADII** *ASTROPHYSICAL JOURNAL*
Behroozi, P. S., Wechsler, R. H., Lu, Y., Hahn, O., Busha, M. T., Klypin, A., Primack, J. R.
2014; 787 (2)
 - **Density mapping with weak lensing and phase information** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Szepietowski, R. M., Bacon, D. J., Dietrich, J. P., Busha, M., Wechsler, R., Melchior, P.
2014; 440 (3): 2191-2200
 - **redMaPPer. I. ALGORITHM AND SDSS DR8 CATALOG** *ASTROPHYSICAL JOURNAL*
Rykoff, E. S., Rozo, E., Busha, M. T., Cunha, C. E., Finoguenov, A., Evrard, A., Hao, J., Koester, B. P., Leauthaud, A., Nord, B., Pierre, M., Reddick, R., Sadibekova, et al
2014; 785 (2)
 - **REIONIZATION HISTORIES OF MILKY WAY MASS HALOS** *ASTROPHYSICAL JOURNAL*
Li, T. Y., Alvarez, M. A., Wechsler, R. H., Abel, T.
2014; 785 (2)
 - **COSMOLOGICAL CONSTRAINTS FROM GALAXY CLUSTERING AND THE MASS-TO-NUMBER RATIO OF GALAXY CLUSTERS: MARGINALIZING OVER THE PHYSICS OF GALAXY FORMATION** *ASTROPHYSICAL JOURNAL*
Reddick, R. M., Tinker, J. L., Wechsler, R. H., Lu, Y.
-

2014; 783 (2)

- **Connecting direct dark matter detection experiments to cosmologically motivated halo models** *PHYSICAL REVIEW D*
Mao, Y., Strigari, L. E., Wechsler, R. H.
2014; 89 (6)
- **THE HERSCHEL STRIPE 82 SURVEY (HerS): MAPS AND EARLY CATALOG** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Viero, M. P., Asboth, V., Roseboom, I. G., Moncelsi, L., Marsden, G., Cooper, E. M., Zemcov, M., ADDISON, G., Baker, A. J., Beelen, A., Bock, J., Bridge, C., Conley, et al
2014; 210 (2)
- **EVOLUTION OF THE STELLAR-TO-DARK MATTER RELATION: SEPARATING STAR-FORMING AND PASSIVE GALAXIES FROM $z=1$ TO 0** *ASTROPHYSICAL JOURNAL*
Tinker, J. L., Leauthaud, A., Bundy, K., George, M. R., Behroozi, P., Massey, R., Rhodes, J., Wechsler, R. H.
2013; 778 (2)
- **Virial scaling of galaxies in clusters: bright to faint is cool to hot** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Wu, H., Hahn, O., Evrard, A. E., Wechsler, R. H., Dolag, K.
2013; 436 (1): 460-469
- **USING CUMULATIVE NUMBER DENSITIES TO COMPARE GALAXIES ACROSS COSMIC TIME** *ASTROPHYSICAL JOURNAL LETTERS*
Behroozi, P. S., Marchesini, D., Wechsler, R. H., Muzzin, A., Papovich, C., Stefanon, M.
2013; 777 (1)
- **Groups of two galaxies in SDSS: implications of colours on star formation quenching time-scales** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Trinh, C. Q., Barton, E. J., Bullock, J. S., Cooper, M. C., Zentner, A. R., Wechsler, R. H.
2013; 436 (1): 635-649
- **Spatially unassociated galaxies contribute significantly to the blended submillimetre galaxy population: predictions for follow-up observations of ALMA sources** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Hayward, C. C., Behroozi, P. S., Somerville, R. S., Primack, J. R., Moreno, J., Wechsler, R. H.
2013; 434 (3): 2572-2581
- **Detecting massive galaxies at high redshift using the Dark Energy Survey** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Davies, L. J., Maraston, C., Thomas, D., Capozzi, D., Wechsler, R. H., Busha, M. T., Banerji, M., Ostrovski, F., Papovich, C., Santiago, B. X., Nichol, R., Maia, M. A., da Costa, et al
2013; 434 (1): 296-312
- **IMPROVED MOCK GALAXY CATALOGS FOR THE DEEP2 GALAXY REDSHIFT SURVEY FROM SUBHALO ABUNDANCE AND ENVIRONMENT MATCHING** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Gerke, B. F., Wechsler, R. H., Behroozi, P. S., Cooper, M. C., Yan, R., Coil, A. L.
2013; 208 (1)
- **THE CONNECTION BETWEEN GALAXIES AND DARK MATTER STRUCTURES IN THE LOCAL UNIVERSE** *ASTROPHYSICAL JOURNAL*
Reddick, R. M., Wechsler, R. H., Tinker, J. L., Behroozi, P. S.
2013; 771 (1)
- **GALAXIES IN X-RAY GROUPS. III. SATELLITE COLOR AND MORPHOLOGY TRANSFORMATIONS** *ASTROPHYSICAL JOURNAL*
George, M. R., Ma, C., Bundy, K., Leauthaud, A., Tinker, J., Wechsler, R. H., Finoguenov, A., Vulcani, B.
2013; 770 (2)
- **CANDELS OBSERVATIONS OF THE ENVIRONMENTAL DEPENDENCE OF THE COLOR-MASS-MORPHOLOGY RELATION AT $z=1.6$** *ASTROPHYSICAL JOURNAL*
Bassett, R., Papovich, C., Lotz, J. M., Bell, E. F., Finkelstein, S. L., Newman, J. A., Tran, K., Almaini, O., Lani, C., Cooper, M., Croton, D., Dekel, A., Ferguson, et al
2013; 770 (1)
- **THE AVERAGE STAR FORMATION HISTORIES OF GALAXIES IN DARK MATTER HALOS FROM $z=0-8$** *ASTROPHYSICAL JOURNAL*
Behroozi, P. S., Wechsler, R. H., Conroy, C.
2013; 770 (1)

- **Unbound particles in dark matter halos** *JOURNAL OF COSMOLOGY AND ASTROPARTICLE PHYSICS*
Behroozi, P. S., Loeb, A., Wechsler, R. H.
2013
- **SEDS: THE SPITZER EXTENDED DEEP SURVEY. SURVEY DESIGN, PHOTOMETRY, AND DEEP IRAC SOURCE COUNTS** *ASTROPHYSICAL JOURNAL*
Ashby, M. L., WILLNER, S. P., Fazio, G. G., Huang, J., Arendt, R., Barmby, P., BARRO, G., Bell, E. F., Bouwens, R., Cattaneo, A., Croton, D., Dave, R., Dunlop, et al
2013; 769 (1)
- **A NEW MILKY WAY HALO STAR CLUSTER IN THE SOUTHERN GALACTIC SKY** *ASTROPHYSICAL JOURNAL*
Balbinot, E., Santiago, B. X., da Costa, L., Maia, M. A., Majewski, S. R., Nidever, D., Rocha-Pinto, H. J., Thomas, D., Wechsler, R. H., Yanny, B.
2013; 767 (2)
- **RHAPSODY. II. SUBHALO PROPERTIES AND THE IMPACT OF TIDAL STRIPPING FROM A STATISTICAL SAMPLE OF CLUSTER-SIZE HALOS** *ASTROPHYSICAL JOURNAL*
Wu, H., Hahn, O., Wechsler, R. H., Behroozi, P. S., Mao, Y.
2013; 767 (1)
- **HALO-TO-HALO SIMILARITY AND SCATTER IN THE VELOCITY DISTRIBUTION OF DARK MATTER** *ASTROPHYSICAL JOURNAL*
Mao, Y., Strigari, L. E., Wechsler, R. H., Wu, H., Hahn, O.
2013; 764 (1)
- **RHAPSODY. I. STRUCTURAL PROPERTIES AND FORMATION HISTORY FROM A STATISTICAL SAMPLE OF RE-SIMULATED CLUSTER-SIZE HALOS** *ASTROPHYSICAL JOURNAL*
Wu, H., Hahn, O., Wechsler, R. H., Mao, Y., Behroozi, P. S.
2013; 763 (2)
- **GRAVITATIONALLY CONSISTENT HALO CATALOGS AND MERGER TREES FOR PRECISION COSMOLOGY** *ASTROPHYSICAL JOURNAL*
Behroozi, P. S., Wechsler, R. H., Wu, H., Busha, M. T., Klypin, A. A., Primack, J. R.
2013; 763 (1)
- **THE ROCKSTAR PHASE-SPACE TEMPORAL HALO FINDER AND THE VELOCITY OFFSETS OF CLUSTER CORES** *ASTROPHYSICAL JOURNAL*
Behroozi, P. S., Wechsler, R. H., Wu, H.
2013; 762 (2)
- **ON THE LACK OF EVOLUTION IN GALAXY STAR FORMATION EFFICIENCY** *ASTROPHYSICAL JOURNAL LETTERS*
Behroozi, P. S., Wechsler, R. H., Conroy, C.
2013; 762 (2)
- **GALAXIES IN X-RAY GROUPS. II. A WEAK LENSING STUDY OF HALO CENTERING** *ASTROPHYSICAL JOURNAL*
George, M. R., Leauthaud, A., Bundy, K., Finoguenov, A., Ma, C., Rykoff, E. S., Tinker, J. L., Wechsler, R. H., Massey, R., Mei, S.
2012; 757 (1)
- **THE CORRELATED FORMATION HISTORIES OF MASSIVE GALAXIES AND THEIR DARK MATTER HALOS** *ASTROPHYSICAL JOURNAL LETTERS*
Tinker, J. L., George, M. R., Leauthaud, A., Bundy, K., Finoguenov, A., Massey, R., Rhodes, J., Wechsler, R. H.
2012; 755 (1)
- **A MEASUREMENT OF THE CORRELATION OF GALAXY SURVEYS WITH CMB LENSING CONVERGENCE MAPS FROM THE SOUTH POLE TELESCOPE** *ASTROPHYSICAL JOURNAL LETTERS*
Bleem, L. E., van Engelen, A., Holder, G. P., Aird, K. A., Armstrong, R., Ashby, M. L., Becker, M. R., Benson, B. A., Biesiadzinski, T., Brodwin, M., Busha, M. T., Carlstrom, J. E., Chang, et al
2012; 753 (1)
- **Sample variance in photometric redshift calibration: cosmological biases and survey requirements** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Cunha, C. E., Huterer, D., Busha, M. T., Wechsler, R. H.
2012; 423 (1): 909-924

- **THE COSMIC ABUNDANCE OF CLASSICAL MILKY WAY SATELLITES** *ASTROPHYSICAL JOURNAL*
Strigari, L. E., Wechsler, R. H.
2012; 749 (1)
- **ROBUST OPTICAL RICHNESS ESTIMATION WITH REDUCED SCATTER** *ASTROPHYSICAL JOURNAL*
Rykoff, E. S., Koester, B. P., Rozo, E., Annis, J., Evrard, A. E., Hansen, S. M., Hao, J., Johnston, D. E., McKay, T. A., Wechsler, R. H.
2012; 746 (2)
- **THE INTEGRATED STELLAR CONTENT OF DARK MATTER HALOS** *ASTROPHYSICAL JOURNAL*
Leauthaud, A., George, M. R., Behroozi, P. S., Bundy, K., Tinker, J., Wechsler, R. H., Conroy, C., Finoguenov, A., Tanaka, M.
2012; 746 (1)
- **COSMOLOGICAL CONSTRAINTS FROM GALAXY CLUSTERING AND THE MASS-TO-NUMBER RATIO OF GALAXY CLUSTERS** *ASTROPHYSICAL JOURNAL*
Tinker, J. L., Sheldon, E. S., Wechsler, R. H., Becker, M. R., Rozo, E., Zu, Y., Weinberg, D. H., Zehavi, I., Blanton, M. R., Busha, M. T., Koester, B. P.
2012; 745 (1)
- **NEW CONSTRAINTS ON THE EVOLUTION OF THE STELLAR-TO-DARK MATTER CONNECTION: A COMBINED ANALYSIS OF GALAXY-GALAXY LENSING, CLUSTERING, AND STELLAR MASS FUNCTIONS FROM $z=0.2$ TO $z=1$** *ASTROPHYSICAL JOURNAL*
Leauthaud, A., Tinker, J., Bundy, K., Behroozi, P. S., Massey, R., Rhodes, J., George, M. R., Kneib, J., Benson, A., Wechsler, R. H., Busha, M. T., Capak, P., Cortes, et al
2012; 744 (2)
- **STATISTICS OF SATELLITE GALAXIES AROUND MILKY-WAY-LIKE HOSTS** *ASTROPHYSICAL JOURNAL*
Busha, M. T., Wechsler, R. H., Behroozi, P. S., Gerke, B. F., Klypin, A. A., Primack, J. R.
2011; 743 (2)
- **THE MASS DISTRIBUTION AND ASSEMBLY OF THE MILKY WAY FROM THE PROPERTIES OF THE MAGELLANIC CLOUDS** *ASTROPHYSICAL JOURNAL*
Busha, M. T., Marshall, P. J., Wechsler, R. H., Klypin, A., Primack, J.
2011; 743 (1)
- **CANDELS: THE COSMIC ASSEMBLY NEAR-INFRARED DEEP EXTRAGALACTIC LEGACY SURVEY** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Grogin, N. A., Kocevski, D. D., Faber, S. M., Ferguson, H. C., Koekemoer, A. M., Riess, A. G., Acquaviva, V., Alexander, D. M., Almaini, O., Ashby, M. L., Barden, M., Bell, E. F., Bournaud, et al
2011; 197 (2)
- **GALAXIES IN X-RAY GROUPS. I. ROBUST MEMBERSHIP ASSIGNMENT AND THE IMPACT OF GROUP ENVIRONMENTS ON QUENCHING** *ASTROPHYSICAL JOURNAL*
George, M. R., Leauthaud, A., Bundy, K., Finoguenov, A., Tinker, J., Lin, Y., Mei, S., Kneib, J., Aussel, H., Behroozi, P. S., Busha, M. T., Capak, P., Coccatto, et al
2011; 742 (2)
- **CANDELS: THE COSMIC ASSEMBLY NEAR-INFRARED DEEP EXTRAGALACTIC LEGACY SURVEY-THE HUBBLE SPACE TELESCOPE OBSERVATIONS, IMAGING DATA PRODUCTS, AND MOSAICS** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Koekemoer, A. M., Faber, S. M., Ferguson, H. C., Grogin, N. A., Kocevski, D. D., Koo, D. C., Lai, K., Lotz, J. M., Lucas, R. A., McGrath, E. J., Ogaz, S., Rajan, A., Riess, et al
2011; 197 (2)
- **EXTRINSIC SOURCES OF SCATTER IN THE RICHNESS-MASS RELATION OF GALAXY CLUSTERS** *ASTROPHYSICAL JOURNAL*
Roza, E., Rykoff, E., Koester, B., Nord, B., Wu, H., Evrard, A., Wechsler, R.
2011; 740 (2)
- **A THEORETICAL FRAMEWORK FOR COMBINING TECHNIQUES THAT PROBE THE LINK BETWEEN GALAXIES AND DARK MATTER** *ASTROPHYSICAL JOURNAL*
Leauthaud, A., Tinker, J., Behroozi, P. S., Busha, M. T., Wechsler, R. H.
2011; 738 (1)
- **HOW COMMON ARE THE MAGELLANIC CLOUDS?** *ASTROPHYSICAL JOURNAL*
Liu, L., Gerke, B. F., Wechsler, R. H., Behroozi, P. S., Busha, M. T.
2011; 733 (1)

- **Dark matter at the end of the Galaxy** *PHYSICAL REVIEW D*
Lisanti, M., Strigari, L. E., Wacker, J. G., Wechsler, R. H.
2011; 83 (2)
- **THE VORONOI TESSELLATION CLUSTER FINDER IN 2+1 DIMENSIONS** *ASTROPHYSICAL JOURNAL*
Soares-Santos, M., de Carvalho, R. R., Annis, J., Gal, R. R., La Barbera, F., Lopes, P. A., Wechsler, R. H., Busha, M. T., Gerke, B. F.
2011; 727 (1)
- **COUNTS-IN-CYLINDERS IN THE SLOAN DIGITAL SKY SURVEY WITH COMPARISONS TO N-BODY SIMULATIONS** *ASTROPHYSICAL JOURNAL*
Berrier, H. D., Barton, E. J., Berrier, J. C., Bullock, J. S., Zentner, A. R., Wechsler, R. H.
2011; 726 (1)
- **A GMBCG GALAXY CLUSTER CATALOG OF 55,424 RICH CLUSTERS FROM SDSS DR7** *ASTROPHYSICAL JOURNAL SUPPLEMENT SERIES*
Hao, J., McKay, T. A., Koester, B. P., Rykoff, E. S., Rozo, E., Annis, J., Wechsler, R. H., Evrard, A., Siegel, S. R., Becker, M., Busha, M., Gerdes, D., Johnston, et al
2010; 191 (2): 254-274
- **A COMPREHENSIVE ANALYSIS OF UNCERTAINTIES AFFECTING THE STELLAR MASS-HALO MASS RELATION FOR $0 < z < 4$** *ASTROPHYSICAL JOURNAL*
Behroozi, P. S., Conroy, C., Wechsler, R. H.
2010; 717 (1): 379-403
- **ArborZ: PHOTOMETRIC REDSHIFTS USING BOOSTED DECISION TREES** *ASTROPHYSICAL JOURNAL*
Gerdes, D. W., Sypniewski, A. J., McKay, T. A., Hao, J., Weis, M. R., Wechsler, R. H., Busha, M. T.
2010; 715 (2): 823-832
- **THE IMPACT OF THEORETICAL UNCERTAINTIES IN THE HALO MASS FUNCTION AND HALO BIAS ON PRECISION COSMOLOGY** *ASTROPHYSICAL JOURNAL*
Wu, H., Zentner, A. R., Wechsler, R. H.
2010; 713 (2): 856-864
- **ANNEALING A FOLLOW-UP PROGRAM: IMPROVEMENT OF THE DARK ENERGY FIGURE OF MERIT FOR OPTICAL GALAXY CLUSTER SURVEYS** *ASTROPHYSICAL JOURNAL*
Wu, H., Rozo, E., Wechsler, R. H.
2010; 713 (2): 1207-1218
- **THE IMPACT OF INHOMOGENEOUS REIONIZATION ON THE SATELLITE GALAXY POPULATION OF THE MILKY WAY** *ASTROPHYSICAL JOURNAL*
Busha, M. T., Alvarez, M. A., Wechsler, R. H., Abel, T., Strigari, L. E.
2010; 710 (1): 408-420
- **INTERPRETING THE CLUSTERING OF DISTANT RED GALAXIES** *ASTROPHYSICAL JOURNAL*
Tinker, J. L., Wechsler, R. H., Zheng, Z.
2010; 709 (1): 67-76
- **COSMOLOGICAL CONSTRAINTS FROM THE SLOAN DIGITAL SKY SURVEY MaxBCG CLUSTER CATALOG** *ASTROPHYSICAL JOURNAL*
Roza, E., Wechsler, R. H., Rykoff, E. S., Annis, J. T., Becker, M. R., Evrard, A. E., Frieman, J. A., Hansen, S. M., Hao, J., Johnston, D. E., Koester, B. P., McKay, T. A., Sheldon, et al
2010; 708 (1): 645-660
- **CROSS-CORRELATION WEAK LENSING OF SDSS GALAXY CLUSTERS. I. MEASUREMENTS** *ASTROPHYSICAL JOURNAL*
Sheldon, E. S., Johnston, D. E., Scranton, R., Koester, B. P., McKay, T. A., Oyaizu, H., Cunha, C., Lima, M., Lin, H., Frieman, J. A., Wechsler, R. H., Annis, J., Mandelbaum, et al
2009; 703 (2): 2217-2231
- **CONNECTING REIONIZATION TO THE LOCAL UNIVERSE** *ASTROPHYSICAL JOURNAL LETTERS*
Alvarez, M. A., Busha, M., Abel, T., Wechsler, R. H.
2009; 703 (2): L167-L171
- **CROSS-CORRELATION WEAK LENSING OF SDSS GALAXY CLUSTERS. III. MASS-TO-LIGHT RATIOS** *ASTROPHYSICAL JOURNAL*

-
- Sheldon, E. S., Johnston, D. E., Masjedi, M., McKay, T. A., Blanton, M. R., Scranton, R., Wechsler, R. H., Koester, B. P., Hansen, S. M., Frieman, J. A., Annis, J. 2009; 703 (2): 2232-2248
- **GALAXY MERGERS AND DARK MATTER HALO MERGERS IN Lambda CDM: MASS, REDSHIFT, AND MASS-RATIO DEPENDENCE** *ASTROPHYSICAL JOURNAL*
Stewart, K. R., Bullock, J. S., Barton, E. J., Wechsler, R. H. 2009; 702 (2): 1005-1015
 - **PRECISION MEASUREMENTS OF THE CLUSTER RED SEQUENCE USING AN ERROR-CORRECTED GAUSSIAN MIXTURE MODEL** *ASTROPHYSICAL JOURNAL*
Hao, J., Koester, B. P., McKay, T. A., Rykoff, E. S., Rozo, E., Evrard, A., Annis, J., Becker, M., Busha, M., Gerdes, D., Johnston, D. E., Sheldon, E., Wechsler, et al 2009; 702 (1): 745-758
 - **GAS-RICH MERGERS IN LCDM: DISK SURVIVABILITY AND THE BARYONIC ASSEMBLY OF GALAXIES** *ASTROPHYSICAL JOURNAL*
Stewart, K. R., Bullock, J. S., Wechsler, R. H., Maller, A. H. 2009; 702 (1): 307-317
 - **IMPROVEMENT OF THE RICHNESS ESTIMATES OF maxBCG CLUSTERS** *ASTROPHYSICAL JOURNAL*
Roza, E., Rykoff, E. S., Koester, B. P., McKay, T., Hao, J., Evrard, A., Wechsler, R. H., Hansen, S., Sheldon, E., Johnston, D., Becker, M., Annis, J., Bleem, et al 2009; 703 (1): 601-613
 - **THE GALAXY CONTENT OF SDSS CLUSTERS AND GROUPS** *ASTROPHYSICAL JOURNAL*
Hansen, S. M., Sheldon, E. S., Wechsler, R. H., Koester, B. P. 2009; 699 (2): 1333-1353
 - **CONSTRAINING THE SCATTER IN THE MASS-RICHNESS RELATION OF maxBCG CLUSTERS WITH WEAK LENSING AND X-RAY DATA** *ASTROPHYSICAL JOURNAL*
Roza, E., Rykoff, E. S., Evrard, A., Becker, M., McKay, T., Wechsler, R. H., Koester, B. P., Hao, J., Hansen, S., Sheldon, E., Johnston, D., Annis, J., Frieman, et al 2009; 699 (1): 768-781
 - **MAPPING THE DARK MATTER FROM UV LIGHT AT HIGH REDSHIFT: AN EMPIRICAL APPROACH TO UNDERSTAND GALAXY STATISTICS** *ASTROPHYSICAL JOURNAL*
Lee, K., Giavalisco, M., Conroy, C., Wechsler, R. H., Ferguson, H. C., Somerville, R. S., Dickinson, M. E., Urry, C. M. 2009; 695 (1): 368-390
 - **THE ASSEMBLY OF GALAXY CLUSTERS** *ASTROPHYSICAL JOURNAL*
Berrier, J. C., Stewart, K. R., Bullock, J. S., Purcell, C. W., Barton, E. J., Wechsler, R. H. 2009; 690 (2): 1292-1302
 - **THE EFFECTS OF HALO ASSEMBLY BIAS ON SELF-CALIBRATION IN GALAXY CLUSTER SURVEYS** *ASTROPHYSICAL JOURNAL*
Wu, H., Roza, E., Wechsler, R. H. 2008; 688 (2): 729-741
 - **Merger histories of galaxy halos and implications for disk survival** *ASTROPHYSICAL JOURNAL*
Stewart, K. R., Bullock, J. S., Wechsler, R. H., Maller, A. H., Zentner, A. R. 2008; 683 (2): 597-610
 - **The L-X-M relation of clusters of galaxies** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Rykoff, E. S., Evrard, A. E., McKay, T. A., Becker, M. R., Johnston, D. E., Koester, B. P., Nord, B., Roza, E., Sheldon, E. S., Stanek, R., Wechsler, R. H. 2008; 387 (1): L28-L32
 - **Optical cluster finding with an adaptive matched-filter technique: Algorithm and comparison with simulations** *ASTROPHYSICAL JOURNAL*
Dong, F., Pierpaoli, E., Gunn, J. E., Wechsler, R. H. 2008; 676 (2): 868-879
 - **Measuring the mean and scatter of the X-ray luminosity-optical richness relation for maxBCG galaxy clusters** *ASTROPHYSICAL JOURNAL*
Rykoff, E. S., McKay, T. A., Becker, M. R., Evrard, A., Johnston, D. E., Koester, B. P., Roza, E., Sheldon, E. S., Wechsler, R. H. 2008; 675 (2): 1106-1124
 - **Modeling the galaxy three-point correlation function** *ASTROPHYSICAL JOURNAL*
-

- Marin, F. A., Wechsler, R. H., Frieman, J. A., Nichol, R. C.
2008; 672 (2): 849-860
- **The DEEP2 Galaxy Redshift Survey: Color and luminosity dependence of galaxy clustering at z similar to 1** *ASTROPHYSICAL JOURNAL*
Coil, A. L., Newman, J. A., Croton, D., Cooper, M. C., Davis, M., Faber, S. M., Gerke, B. F., Koo, D. C., Padmanabhan, N., Wechsler, R. H., Weiner, B. J.
2008; 672 (1): 153-176
 - **The Evolution of Galaxy Clustering and the Galaxy-Halo Connection** *International Conference on Panoramic Views of Galaxy Formation and Evolution*
Wechsler, R. H.
ASTRONOMICAL SOC PACIFIC.2008: 82-89
 - **Isolating triggered star formation** *ASTROPHYSICAL JOURNAL*
Barton, E. J., Arnold, J. A., Zentner, A. R., Bullock, J. S., Wechsler, R. H.
2007; 671 (2): 1538-1549
 - **The mean and scatter of the velocity dispersion-optical richness relation for maxBCG galaxy clusters** *ASTROPHYSICAL JOURNAL*
Becker, M. R., McKay, T. A., Koester, B., Wechsler, R. H., Rozo, E., Evrard, A., Johnston, D., Sheldon, E., Annis, J., Lau, E., Nichol, R., Miller, C.
2007; 669 (2): 905-928
 - **The hierarchical build-up of massive galaxies and the intracluster light since $z=1$** *ASTROPHYSICAL JOURNAL*
Conroy, C., Wechsler, R. H., Kravtsov, A. V.
2007; 668 (2): 826-838
 - **MaxBCG: A red-sequence galaxy cluster finder** *ASTROPHYSICAL JOURNAL*
Koester, B. P., McKay, T. A., Annis, J., Wechsler, R. H., Evrard, A. E., Rozo, E., Bleem, L., Sheldon, E. S., Johnston, D.
2007; 660 (1): 221-238
 - **A MaxBCG catalog of 13,823 galaxy clusters from the sloan digital sky survey** *ASTROPHYSICAL JOURNAL*
Koester, B. P., McKay, T. A., Annis, J., Wechsler, R. H., Evrard, A., Bleem, L., Becker, M., Johnston, D., Sheldon, E., Nichol, R., Miller, C., Scranton, R., Bahcall, et al
2007; 660 (1): 239-255
 - **Cross-correlation lensing: Determining galaxy and cluster mass profiles from statistical weak-lensing measurements** *ASTROPHYSICAL JOURNAL*
Johnston, D. E., Sheldon, E. S., Tasitsiomi, A., Frieman, J. A., Wechsler, R. H., McKay, T. A.
2007; 656 (1): 27-41
 - **Close galaxy counts as a probe of hierarchical structure formation** *ASTROPHYSICAL JOURNAL*
Berrier, J. C., Bullock, J. S., Barton, E. J., Guenther, H. D., Zentner, A. R., Wechsler, R. H.
2006; 652 (1): 56-70
 - **Modeling luminosity-dependent galaxy clustering through cosmic time** *ASTROPHYSICAL JOURNAL*
Conroy, C., Wechsler, R. H., Kravtsov, A. V.
2006; 647 (1): 201-214
 - **The effect of large-scale structure on the SDSS galaxy three-point correlation function** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Nichol, R. C., Sheth, R. K., Suto, Y., Gray, A. J., Kayo, I., Wechsler, R. H., Marin, F., Kulkarni, G., Blanton, M., Connolly, A. J., Gardner, J. P., Jain, B., Miller, et al
2006; 368 (4): 1507-1514
 - **The shape of dark matter haloes: dependence on mass, redshift, radius and formation** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Allgood, B., Flores, R. A., Primack, J. R., Kravtsov, A. V., Wechsler, R. H., Faltenbacher, A., Bullock, J. S.
2006; 367 (4): 1781-1796
 - **Measurement of galaxy cluster sizes, radial profiles, and luminosity functions from SDSS photometric data** *ASTROPHYSICAL JOURNAL*
Hansen, S. M., McKay, T. A., Wechsler, R. H., Annis, J., Sheldon, E. S., Kimball, A.
2005; 633 (1): 122-137
 - **The ultimate halo mass in Lambda CDM universe** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Busha, M. T., Evrard, A. E., Adams, F. C., Wechsler, R. H.
2005; 363 (1): L11-L15

- **Galaxy-galaxy lensing: dissipationless simulations versus the halo model** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Mandelbaum, R., Tasitsiomi, A., Seljak, U., Kravtsov, A. V., Wechsler, R. H.
2005; 362 (4): 1451-1462
- **The C4 clustering algorithm: clusters of galaxies in the Sloan Digital Sky Survey** *ASTRONOMICAL JOURNAL*
Miller, C. J., Nichol, R. C., Reichart, D., Wechsler, R. H., Evrard, A. E., Annis, J., McKay, T. A., Bahcall, N. A., Bernardi, M., Boehringer, H., Connolly, A. J., Goto, T., Kniazev, et al
2005; 130 (3): 968-1001
- **The physics of galaxy clustering. I. A model for subhalo populations** *ASTROPHYSICAL JOURNAL*
Zentner, A. R., Berlind, A. A., Bullock, J. S., Kravtsov, A. V., Wechsler, R. H.
2005; 624 (2): 505-525
- **Modeling galaxy-mass correlations in dissipationless simulations** *ASTROPHYSICAL JOURNAL*
Tasitsiomi, A., Kravtsov, A. V., Wechsler, R. H., Primack, J. R.
2004; 614 (2): 533-546
- **The dark side of the halo occupation distribution** *ASTROPHYSICAL JOURNAL*
Kravtsov, A. V., Berlind, A. A., Wechsler, R. H., Klypin, A. A., Gottlober, S., Allgood, B., Primack, J. R.
2004; 609 (1): 35-49
- **Future evolution of cosmic structure in an accelerating universe** *ASTROPHYSICAL JOURNAL*
Busha, M. T., Adams, F. C., Wechsler, R. H., Evrard, A. E.
2003; 596 (2): 713-724
- **The asymptotic structure of space-time** *INTERNATIONAL JOURNAL OF MODERN PHYSICS D*
Adams, F. C., Busha, M. T., Evrard, A. E., Wechsler, R. H.
2003; 12 (9): 1743-1750
- **The masses of Lyman break galaxies** *Workshop on the Mass of Galaxies at Low and High Redshift*
Primack, J. R., Wechsler, R. H., Somerville, R. S.
SPRINGER-VERLAG BERLIN.2003: 284–289
- **The origin of angular momentum in dark matter halos** *ASTROPHYSICAL JOURNAL*
Vitvitska, M., Klypin, A. A., Kravtsov, A. V., Wechsler, R. H., Primack, J. R., Bullock, J. S.
2002; 581 (2): 799-809
- **The Las Campanas Distant Cluster Survey correlation function** *ASTROPHYSICAL JOURNAL*
Gonzalez, A. H., Zaritsky, D., Wechsler, R. H.
2002; 571 (1): 129-135
- **Concentrations of dark halos from their assembly histories** *ASTROPHYSICAL JOURNAL*
Wechsler, R. H., Bullock, J. S., Primack, J. R., Kravtsov, A. V., Dekel, A.
2002; 568 (1): 52-70
- **Galaxy halo occupation at high redshift** *MONTHLY NOTICES OF THE ROYAL ASTRONOMICAL SOCIETY*
Bullock, J. S., Wechsler, R. H., Somerville, R. S.
2002; 329 (1): 246-256
- **Tracing cosmic evolution with the Las Campanas Distant Cluster Survey** *Workshop on Tracing Cosmic Evolution with Galaxy Clusters*
Gonzalez, A. H., Dalcanton, J. J., Nelson, A. E., Simard, L., Zaritsky, D., Wechsler, R. H.
ASTRONOMICAL SOC PACIFIC.2002: 379–380
- **Galaxy formation at z similar to 3: Constraints from spatial clustering** *ASTROPHYSICAL JOURNAL*
Wechsler, R. H., Somerville, R. S., Bullock, J. S., Kolatt, T. S., Primack, J. R., Blumenthal, G. R., Dekel, A.
2001; 554 (1): 85-103
- **Cosmological implications of Lyman-break galaxy clustering** *9th Astrophysics Conference*
Wechsler, R. H., Gross, M. A., Primack, J. R., Blumenthal, G. R., Dekel, A., Somerville, R. S.
AMER INST PHYSICS.1999: 147–151

- **Clustering of high-redshift galaxies: relating LBGs to dark matter halos** *Meeting on Clustering at High Redshift*
Wechsler, R. H., Bullock, J. S., Somerville, R. S., Kolatt, T. S., Primack, J. R., Blumenthal, G. R., Dekel, A.
ASTRONOMICAL SOC PACIFIC.1999: 29–33
- **The nature of high-redshift galaxies** *Workshop on Primordial Black Holes and Hawking Radiation/3rd International Symposium on Sources and Detection of Dark Matter in the Universe*
Primack, J. R., Somerville, R. S., Faber, S. M., Wechsler, R. H.
ELSEVIER SCIENCE BV.1998: 15–22
- **Implications of spikes in the redshift distribution of z similar to 3 galaxies** *ASTROPHYSICAL JOURNAL*
Wechsler, R. H., Gross, M. A., Primack, J. R., Blumenthal, G. R., Dekel, A.
1998; 506 (1): 19-32