

# München

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## 1 Personal und Ausstattung

### 1.1 Personalstand

#### *Lehrstühle:*

Prof. Dr. Dr.habil. R. Bender [-6001], Prof. Dr. Dr.habil. A. Burkert [-5992], Prof. Dr. J. Mohr [-5967]

#### *Professoren und Privatdozenten:*

Prof. Dr. Dr.habil. R. Bender [-6001], Prof. Dr. Dr.habil. A. Burkert [-5992], PD Dr. Dr.habil. K. Butler [-6018], PD Dr. Dr.habil. K. Dolag [-5994], Prof. Dr. B. Ercolano [-6974], Prof. i.R. Dr. Dr.habil. T. Gehren [-6035], Prof. Dr. T. Giannantonio [-6035] Prof. Dr. Dr.habil. H. Lesch [-6007], Prof. Dr. J. Mohr [-5967], Dr. B. Moster (DFG/Emmy-Noether) [9284], Prof. Dr. Dr.habil. A.W.A. Pauldrach [-6021], Prof. Dr. T. Preibisch [-6016], PD Dr. Dr.habil. J. Puls [-6022], PD Dr. Dr.habil. R.P. Saglia [-5998] (MPE), Prof. Dr. J. Weller [-5976]

#### *Wissenschaftliche Mitarbeiter:*

Dr. C. Alig [-5991], Dr. I. Balestra [-9298], Dr. H. Barwig [-5974], Dr. F. Beaujean, Dr. A. Beck [-6031], Dr. A. Beifiori [-6017](LMU), Dr. A. Bode (MPE), Dr. J. Chan (MPE), Dr. M. Costanzi [-5989], Dr. J. Dietrich [-5942], Dr. P. Erwin (MPE), Dr. M. Fabricius (MPE), Dr. D. Farrow (MPE), Dr. K. Fierlinger (MPE), Dr. M. Fossati (MPE), Dr. R. Gabler [-6019], Dr. A. Galametz (MPE), Dr. C. Gössl [-5972], Dr. M. Gritschneider [-6986](DFG), Dr. F. Grupp [-6005], Dr. R. Häfner [-6012], Dr. N. Hamaus [-9294], Dr. T. Hoffmann [-6024], Dr. D. Hubber [-9279](EXC), Dr. U. Hoppe [-5997], Dr. B. Hoyle [-5989](MPE), Dr. H. Israel [-6949], Dr. M. Klein [-6006], Dr. M. Kümmel [-5993], Dr. G.-X. Li [-6030] (DFG), Dr. X. Mazzalay (MPE), Dr. J. T. Mendel (MPE), Dr. M. Mirkazemi, Dr. A. Monna [-5983](MPE), Dr. F. Montesano (MPE), Dr. J. Müller [-6007], Dr. C. Obermeier [-5995](MPE), Dr. M. Opitsch (MPE), Dr. K. Paech [-5895](EXC), Dr. M. Pannella [-6006], Dr. M. Petkova, Dr. G. Picogna [-6973](EXC), Dr. D. Rapetti, Dr. R. Remus [-6986], Dr. A. Riffeser [-5973], Dr. V. Roccatagliata [-6973](DFG), Dr. A. Sanchez (MPE), Dr. A. Saro [-6034], Dr. S. Seitz [-5996], Dr. J. Snigula [-6027](MPE), Dr. V. Strazzullo [-6033], Dr. J.

Thomas (MPE), Dr. M. Trevor (MPE), Dr. T. Vassallo [-5918], Dr. L. Wang [-5983] (MPE), Dr. M. Wetzstein [-5918], Dr. D. Wilman [-5998] (DFG), Dr. M. Zintl [-5991] (EXC)

*Doktoranden:*

MSci A. Arth [-5847] (MPE), MSci A. Ballone (EXC), Dipl.-Phys. M. Behrendt (MPE), MSci R. Capasso [-6029], MSci L.P. Carneiro [-6029], MSci F. Finozzi (MPE), MSci O. Friedrich [-5978] (TR33), MSci S. Grandis [-6029], MSci N. Gupta [-6023], MSci M. Häuser [-5846] (BMBF), MSci S. Hagstotz [-5987] (TR33), MSci S. Heigl [-5970], MSci L. Hennicker [-6004] (DFG), MSci J. Hou (TR33), MSci H. Kellermann [-5983] (MPE), MSci M. Kluge [-5981] (MPE), MSci M. Kodric [-6975], MSci M. Lippich-Golobart (MPE, TR33), MSci G. Pollina [-5987] (EXC), MSci A. Ragagnin [-5979], MSci M.M. Rau [-5978] (TR33), MSci K. Sandesh (MPE), MSci P. Schneider [-6029], MSci F. Schulze [6968] (MPE), MSci L. Steinborn [-5990] (TR33), MSci C. Stern [-6029], MSci M. Tazzari (ESO), MSci A. Teklu [-6968] (EXC), MSci T. Tutis [-5987] (EXC), MSci T. Varga [-5982] (MPE), Dipl.-Phys. J. Weber [-6030] (DFG)

*Diplomanden und Masteranden:*

E. Amazo-Gomez [-5977], N. Baisert [-5983], M. Bianco [-5979], V. Fahremschon (MPE), S. Flaischlen [-5991], P. Förster [-5990], C. Hackl [-5972], S. Hammer [-5979], J. Jennings [-5981], H. Jeon [-5970], J. Kaminski [-5979], A. Kakoschke [-5979], M. Kastl [-5981], M. Ködel [-6004], R. Lohmeyer [-5979], P. Luppe [-5981], E. Mevius [-5979], K. Monsch [-5970], J. Osada [-5977], L. Porth [-5982], L. Reb [-5978], F. Rizzuto [-5982], E. Sanchis [-5979], X. Shao [-5981], G. Temple [-5979], J. Wolf [-5982], A. Zormpas [-5979]

*Technisches Personal und Softwareentwickler:*

Dipl.-Phys. A. Bohnet (MPE), M. Gillhuber (MPE), Dipl.-Ing.(FH) H.J. Hess [-6010], MSci. M. Häuser [5846] (BMBF), A. Karasz [-5986], Dipl.-Ing.(FH) H. Kravcar [-5971] (BMBF), Dipl. Phys F. Lang-Bardl [-6965], Dipl.-Phys. J. Richter [-6013] (BMBF), Dr. J. Schlichter [-6011] (BMBF), L. Schneiders-Fesl [-6025], M. Siedschlag [-5970], Dipl.-Phys. M. Wegner [-6020] (BMBF), P. Well [-5988]

*Observatorium Wendelstein:*

Dipl.-Geophys. W. Mitsch [08023/8198-0], C. Ries [08023/8198-0], M. Schmidt [08023/8198-0]

*Sekretariat und Verwaltung:*

N. Auer [-6095], S. Grötsch [-6001], U. Le Guay [-6000], G. Niggli [-5869]

## 1.2 Personelle Veränderungen

*Ausgeschieden:*

A. Brucalassi (31.07.2016), J. Dale (31.08.2016), I-N. Chiu (30.06.2016), B. Gazkowski (30.06.2016), J. Grieb (30.04.2016), J. Koppenhöfer (30.04.2016), D. Rapetti (30.06.2016), S. Salazar (30.06.2016), M. Wetzstein (30.09.2016)

*Neueinstellungen und Änderungen des Anstellungsverhältnisses:*

M. Behrendt (01.01.2016), M. Costanzi (30.06.2016), T. Giannantonio (01.10.2016), S. Hagstotz (31.08.2016), J. Hou (01.09.2016), B. Hoyle (31.08.2016), H. Israel (01.01.2016), M. Kodric (01.01.2016), B. Moster (01.03.2016), G. Picogna (01.04.2016), F. Schulze (01.06.2016), T. Tutis (01.09.2016), M. Zintl (01.12.2016)

## **2 Lehrtätigkeit und Prüfungen**

### **2.1 Lehrtätigkeiten**

Vertreten durch Prof. Dr. R. Bender, Prof. Dr. A. Burkert, PD Dr. K. Butler, Prof. Dr. B. Ercolano, Prof. Dr. T. Giannantonio, Prof. Dr. H. Lesch, Prof. Dr. J. Mohr, Dr. B. Moster, Prof. Dr. A.W.A. Pauldrach, Prof. Dr. Th. Preibisch, PD Dr. J. Puls, PD Dr. R.P. Saglia, und Prof. Dr. J. Weller wurde die Lehre im Gebiet der Physik, Astronomie und Astrophysik an der LMU-München (incl. IMPRS) durchgeführt.

### **2.2 Prüfungen**

Es wurden 32 Naturwissenschaftliche Vorprüfungen in Zahmedizin, 29 Bachelorprüfungen in Physik, 68 Promotionsprüfungen in Physik und 3 Habilitationen in Physik und Astronomie abgenommen.

## **3 Wissenschaftliche Arbeiten**

### **3.1 Kosmologie und Strukturbildung**

- Beobachtung und Untersuchung der Struktur, Dynamik und Entwicklung des Universums.  
(J. Dietrich, J. Mohr, A. Saro, V. Strazzullo)
- Kosmologische Beobachtungen und Untersuchungen zur Expansionsgeschichte des Universums sowie zur Bildung großräumiger Strukturen.  
(J. Weller, R. Bender, S. Seitz, A. Pauldrach, T. Hoffmann)
- Beobachtungen und Interpretation zur Verteilung kosmischer Hohlräume.  
(J. Weller)
- Entwicklung und Anwendung von “Machine Learning” Methoden zur Bestimmung photometrischer Rotverschiebungen.  
(J. Weller, S. Seitz)
- Untersuchungen zur Ionisierungsgeschichte des Universums mit Hilfe der kosmischen Hintergrundstrahlung.  
(J. Weller)
- Untersuchung und kosmologische Beobachtung der Dunklen Energie und modifizierter Gravitation.  
(J. Weller, S. Seitz, R. Bender)

### **3.2 Extragalaktische Astronomie**

- Beobachtungen und Untersuchungen der Struktur, Dynamik und Entwicklung von Galaxien und Galaxienhaufen unter Berücksichtigung von Dunkler Energie, Dunkler Materie, Gravitationslinsen und Schwarzen Löchern.  
(R. Bender, R.P. Saglia, S. Seitz, U. Hopp, J. Weller)
- Numerische Simulationen zur Entstehung und Entwicklung von Galaxien, Galaxiengruppen und -haufen und Strukturbildung.  
(A. Burkert, K. Dolag, J. Weller)

### **3.3 Sterne und Planeten**

- Suche nach extrasolaren Planeten.  
(R. Bender, R.P. Saglia)

- Numerische Simulationen zur Stern- und Planetenentstehung und zur chemischen Entwicklung protoplanetarer Scheiben.  
(B. Ercolano, A. Burkert)
- Beobachtungen von Sternen sowie Untersuchungen zu deren Struktur, Entstehung, Entwicklung und Endphasen.  
(A. Burkert, T. Preibisch, B. Ercolano, A. Pauldrach, J. Puls, K. Butler, T. Hoffmann, A. Riffeser, R. Bender, S. Seitz, U. Hopp, C. Gössl)

### 3.4 Plasma-Astrophysik

- Untersuchungen zur Dynamik von Magnetfeldern in ionisierten Plasmen mit Staub und Neutralgas.  
(H. Lesch, K. Dolag)

### 3.5 Instrumentenentwicklung

- Entwicklung von Spektrographen sowie Instrumenten-Bau für moderne Teleskope.  
(R. Bender, B. Muschielok, A. Hess, F. Grupp, C. Gössl, F. Lang, U. Hopp)
- Betrieb des Wendelsteinobservatoriums durch zwei Teleskope mit 2m und 40cm Hauptspiegeldurchmesser.  
(R. Bender, U. Hopp, W. Mitsch, A. Riffeser, C. Gössl, F. Lang, C. Ries, M. Schmidt)
- Entwicklung von Algorithmen und Software für die ESA Euclid Mission  
(H. Israel, M. Kuemmel, J. Mohr, T. Vassallo)

## 4 Masterarbeiten, Diplomarbeiten, Dissertationen, Habilitationen

### 4.1 Masterarbeiten, Diplomarbeiten

*Abgeschlossen:*

- Amazo-Gomez, E.: Observational study of convection related phenomena in cool main sequence stars. München, USM, Masterarbeit, 2016
- Augustin, Ramona: Strong Lensing Analysis of Abell 370. München, USM, Masterarbeit, 2016
- Bolze, Riccardo: Approximate mock catalogues for the Hobby-Eberly Telescope Dark Energy Experiment. München, USM, Masterarbeit, 2016
- Franz, R.: Escape of Ionizing Photons from Galaxies: The role of Porosity and star formation History. München, USM, Masterarbeit, 2016
- Konrad, Norbert: Applying machine learning techniques to observational properties of galaxies in cosmic voids. München, USM, Masterarbeit, 2016
- März, Michael Maximilian: Data Augmentation for Photometric Redshift Estimation. München, USM, Masterarbeit, 2016
- Mevius, Emilio: Simulation of Chemical Enrichment in Galaxies. München, USM, Masterarbeit, 2016
- Porth, Lucas: Nonlinear structure formation and the halo model. München, USM, Masterarbeit, 2016
- Rehmann, Romy Louise: Weak lensing analysis of SZ selected Planck clusters with the 2m Fraunhofer telescope. München, USM, Masterarbeit, 2016
- Varga, Tamás Norbert: Probing the Dark Matter Substructure of Galaxy Clusters via Weak Gravitational Lensing. München, USM, Masterarbeit, 2016

## 4.2 Dissertationen

*Abgeschlossen:*

- Alvarado-Gomez, J: Magnetic fields in Sun-like stars and their effects on circumstellar environments. München, USM, Dissertation, 2016
- Ballone, Alessandro: The Galactic Center cloud G2 as an outflow from a central star. München, USM, Dissertation, 2016
- Chi Chung Chan, Jeffrey: Constraining the formation and evolution of cluster galaxies at  $z \approx 1.5$  using sizes and colour gradients. München, USM, Dissertation, 2016
- Chiu, I-Non: Studies of Baryon Content and Gravitational Lensing Effects in Galaxy Clusters. München, USM, Dissertation, 2016
- Fossati, Matteo: Environmentally driven suppression of star formation in galaxies over the last 10 billion years. München, USM, Dissertation, 2016
- Gaczkowski, B: The origin of the Lupus I molecular cloud Formation between colliding shells? München, USM, Dissertation, 2016
- Grieb, Jan Niklas: Anisotropic galaxy clustering measurements in Fourier space and cosmological implications from the BOSS DR12 sample. München, USM, Dissertation, 2016
- Kosyra, Ralf: Environmental selection effects of Sunyaev Zel'dovich selected clusters of galaxies and instrumentation dedicated to the photometric study of large scale structure. München, USM, Dissertation, 2016
- McLeod, A: Feedback in massive star-forming regions traced by integral field spectroscopy. München, USM, Dissertation, 2016
- Obermeier, Christian: Searching for hot Jupiter transits around cool stars. München, USM, Dissertation, 2016
- Opitsch, Michael: The bar of the Andromeda galaxy revealed by integral field spectroscopy. München, USM, Dissertation, 2016
- Salazar-Albornoz, Salvador: A tomographic approach to the statistical analysis of the large-scale structure of the Universe. München, USM, Dissertation, 2016

## 5 Veröffentlichungen

### 5.1 In Zeitschriften und Büchern

- Abbott, B. P., Abbott, R., Abbott, T. D., et al.: *Supplement: “Localization and Broadband Follow-up of the Gravitational-wave Transient GW150914”* (2016, *ApJL*, 826, L13). *ApJS* **225**, 8 (2016)
- Abbott, B. P., Abbott, R., Abbott, T. D., et al.: *Localization and Broadband Follow-up of the Gravitational-wave Transient GW150914*. *ApJ* **826**, L13 (2016)
- Abbott, T., Abdalla, F. B., Allam, S., et al.: *Cosmology from cosmic shear with Dark Energy Survey Science Verification data*. *Phys. Rev. D* **94**, 022001 (2016)
- Achitouv, I., Baldi, M., Puchwein, E., et al.: *Imprint off ( $R$ ) gravity on nonlinear structure formation*. *Phys. Rev. D* **93**, 103522 (2016)
- Alexander, R. D., Wynn, G. A., Mohammed, H., et al.: *Magnetospheres of hot Jupiters: hydrodynamic models and ultraviolet absorption*. *MNRAS* **456**, 2766 (2016)
- Alvarado-Gómez, J. D., Hussain, G. A. J., Cohen, O., et al.: *Simulating the environment around planet-hosting stars. II. Stellar winds and inner astrospheres*. *A&A* **594**, A95 (2016)
- Alvarado-Gómez, J. D., Hussain, G. A. J., Cohen, O., et al.: *Simulating the environment around planet-hosting stars. I. Coronal structure*. *A&A* **588**, A28 (2016)

- Amodeo, S., Ettori, S., Capasso, R., et al.: *The relation between mass and concentration in X-ray galaxy clusters at high redshift*. A&A **590**, A126 (2016)
- Annis, J., Soares-Santos, M., Berger, E., et al.: *A Dark Energy Camera Search for Missing Supergiants in the LMC after the Advanced LIGO Gravitational-wave Event GW150914*. ApJ **823**, L34 (2016)
- Applegate, D. E., Mantz, A., Allen, S. W., et al.: *Cosmology and astrophysics from relaxed galaxy clusters - IV. Robustly calibrating hydrostatic masses with weak lensing*. MNRAS **457**, 1522 (2016)
- Asensio-Torres, R., Janson, M., Hashimoto, J., et al.: *Polarimetry and flux distribution in the debris disk around HD 32297*. A&A **593**, A73 (2016)
- Balbinot, E., Yanny, B., Li, T. S., et al.: *The Phoenix Stream: A Cold Stream in the Southern Hemisphere*. ApJ **820**, 58 (2016)
- Balestra, I., Mercurio, A., Sartoris, B., et al.: *CLASH-VLT: Dissecting the Frontier Fields Galaxy Cluster MACS J0416.1-2403 with 800 Spectra of Member Galaxies*. ApJS **224**, 33 (2016)
- Ballone, A., Schartmann, M., Burkert, A., et al.: *The G2+G2t Complex as a Fast and Massive Outflow?* ApJ **819**, L28 (2016)
- Balogh, M. L., McGee, S. L., Mok, A., et al.: *Evidence for a change in the dominant satellite galaxy quenching mechanism at  $z = 1$* . MNRAS **456**, 4364 (2016)
- Bastian, N., Niederhofer, F., Kozhurina-Platais, V., et al.: *A young cluster with an extended main-sequence turnoff: confirmation of a prediction of the stellar rotation scenario*. MNRAS **460**, L20 (2016)
- Baxter, E., Clampitt, J., Giannantonio, T., et al.: *Joint measurement of lensing-galaxy correlations using SPT and DES SV data*. MNRAS **461**, 4099 (2016)
- Bayliss, M. B., Ruel, J., Stubbs, C. W., et al.: *SPT-GMOS: A Gemini/GMOS-South Spectroscopic Survey of Galaxy Clusters in the SPT-SZ Survey*. ApJS **227**, 3 (2016)
- Beck, A. M., Dolag, K., Donnert, J. M. F.: *Geometrical on-the-fly shock detection in smoothed particle hydrodynamics*. MNRAS **458**, 2080 (2016)
- Beck, A. M., Murante, G., Arth, A., et al.: *An improved SPH scheme for cosmological simulations*. MNRAS **455**, 2110 (2016)
- Beck, M. C., Beck, A. M., Beck, R., et al.: *New constraints on modelling the random magnetic field of the MW*. J. Cosmology Astropart. Phys. **5**, 056 (2016)
- Becker, M. R., Troxel, M. A., MacCrann, N., et al.: *Cosmic shear measurements with Dark Energy Survey Science Verification data*. Phys. Rev. D **94**, 022002 (2016)
- Behrendt, M., Burkert, A., Schartmann, M.: *Clusters of Small Clumps Can Explain the Peculiar Properties of Giant Clumps in High-redshift Galaxies*. ApJ **819**, L2 (2016)
- Bel, J., Branchini, E., Di Porto, C., et al.: *The VIMOS Public Extragalactic Redshift Survey (VIPERS). On the recovery of the count-in-cell probability distribution function*. A&A **588**, A51 (2016)
- Beutler, F., Seo, H.-J., Ross, A. J., et al.: *The clustering of galaxies in the completed SDSS-III Baryon Oscillation Spectroscopic Survey: Baryon Acoustic Oscillations in Fourier-space*. MNRAS (2016)

- Biffi, V., Borgani, S., Murante, G., et al.: *On the Nature of Hydrostatic Equilibrium in Galaxy Clusters*. ApJ **827**, 112 (2016)
- Bocquet, S., Saro, A., Dolag, K., et al.: *Halo mass function: baryon impact, fitting formulae, and implications for cluster cosmology*. MNRAS **456**, 2361 (2016)
- Bonnett, C., Troxel, M. A., Hartley, W., et al.: *Redshift distributions of galaxies in the Dark Energy Survey Science Verification shear catalogue and implications for weak lensing*. Phys. Rev. D **94**, 042005 (2016)
- Boselli, A., Cuillandre, J. C., Fossati, M., et al.: *Spectacular tails of ionized gas in the Virgo cluster galaxy NGC 4569*. A&A **587**, A68 (2016)
- Brucalassi, A., Pasquini, L., Saglia, R., et al.: *Search for giant planets in M67. III. Excess of hot Jupiters in dense open clusters*. A&A **592**, L1 (2016)
- Burkert, A., Förster Schreiber, N. M., Genzel, R., et al.: *The Angular Momentum Distribution and Baryon Content of Star-forming Galaxies at  $z = 1\text{--}3$* . ApJ **826**, 214 (2016)
- Cabrera-Ziri, I., Bastian, N., Hilker, M., et al.: *Is the escape velocity in star clusters linked to extended star formation histories? Using NGC 7252: W3 as a test case*. MNRAS **457**, 809 (2016)
- Cabrera-Ziri, I., Niederhofer, F., Bastian, N., et al.: *No evidence for younger stellar generations within the intermediate-age massive clusters NGC 1783, NGC 1806 and NGC 411*. MNRAS **459**, 4218 (2016)
- Calderón, D., Ballone, A., Cuadra, J., et al.: *Clump formation through colliding stellar winds in the Galactic Centre*. MNRAS **455**, 4388 (2016)
- Caminha, G. B., Grillo, C., Rosati, P., et al.: *CLASH-VLT: A highly precise strong lensing model of the galaxy cluster RXC J2248.7-4431 (Abell S1063) and prospects for cosmography*. A&A **587**, A80 (2016)
- Caminha, G. B., Karman, W., Rosati, P., et al.: *Discovery of a faint, star-forming, multiply lensed, Lyman- $\alpha$  blob*. A&A **595**, A100 (2016)
- Capozzi, D., Maraston, C., Daddi, E., et al.: *Revisiting the role of the thermally pulsating asymptotic-giant-branch phase in high-redshift galaxies*. MNRAS **456**, 790 (2016)
- Carbone, C., Petkova, M., Dolag, K.: *DEMNUni: ISW, Rees-Sciama, and weak-lensing in the presence of massive neutrinos*. J. Cosmology Astropart. Phys. **7**, 034 (2016)
- Carneiro, L. P., Puls, J., Sundqvist, J. O., et al.: *Atmospheric NLTE models for the spectroscopic analysis of blue stars with winds. III. X-ray emission from wind-embedded shocks*. A&A **590**, A88 (2016)
- Chan, J. C. C., Beifiori, A., Mendel, J. T., et al.: *Sizes, colour gradients and resolved stellar mass distributions for the massive cluster galaxies in XMMUJ2235-2557 at  $z = 1.39$* . MNRAS **458**, 3181 (2016)
- Chang, C., Pujol, A., Gaztañaga, E., et al.: *Galaxy bias from the Dark Energy Survey Science Verification data: combining galaxy density maps and weak lensing maps*. MNRAS **459**, 3203 (2016)
- Chiu, I., Desai, S., Liu, J.: *ComEst: A completeness estimator of source extraction on astronomical imaging*. Astronomy and Computing **16**, 79 (2016)
- Chiu, I., Dietrich, J. P., Mohr, J., et al.: *Detection of enhancement in number densities of background galaxies due to magnification by massive galaxy clusters*. MNRAS **457**, 3050 (2016)

- Chiu, I., Mohr, J., McDonald, M., et al.: *Baryon content of massive galaxy clusters at  $0.57 < z < 1.33$* . MNRAS **455**, 258 (2016)
- Chiu, I., Saro, A., Mohr, J., et al.: *Stellar mass to halo mass scaling relation for X-ray-selected low-mass galaxy clusters and groups out to redshift  $z \approx 1$* . MNRAS **458**, 379 (2016)
- Clarke, S. D., Whitworth, A. P., Hubber, D. A.: *Perturbation growth in accreting filaments*. MNRAS **458**, 319 (2016)
- Clerkin, L., Kirk, D., Manera, M., et al.: *Testing the lognormality of the galaxy and weak lensing convergence distributions from Dark Energy Survey maps*. MNRAS (2016)
- Comparat, J., Delubac, T., Jouvel, S., et al.: *SDSS-IV eBOSS emission-line galaxy pilot survey*. A&A **592**, A121 (2016)
- Consolandi, G., Gavazzi, G., Fumagalli, M., et al.: *Robust automatic photometry of local galaxies from SDSS. Dissecting the color magnitude relation with color profiles*. A&A **591**, A38 (2016)
- Cowperthwaite, P. S., Berger, E., Soares-Santos, M., et al.: *A DECam Search for an Optical Counterpart to the LIGO Gravitational-wave Event GW151226*. ApJ **826**, L29 (2016)
- Crawford, T. M., Chown, R., Holder, G. P., et al.: *Maps of the Magellanic Clouds from Combined South Pole Telescope and PLANCK Data*. ApJS **227**, 23 (2016)
- Crocce, M., Carretero, J., Bauer, A. H., et al.: *Galaxy clustering, photometric redshifts and diagnosis of systematics in the DES Science Verification data*. MNRAS **455**, 4301 (2016)
- Crowther, P. A., Caballero-Nieves, S. M., Bostroem, K. A., et al.: *The R136 star cluster dissected with Hubble Space Telescope/STIS. I. Far-ultraviolet spectroscopic census and the origin of He II  $\lambda 1640$  in young star clusters*. MNRAS **458**, 624 (2016)
- Cui, W., Power, C., Knebe, A., et al.: *nIFTy galaxy cluster simulations - IV. Quantifying the influence of baryons on halo properties*. MNRAS **458**, 4052 (2016)
- da Silva, R., Lemasle, B., Bono, G., et al.: *Neutron-capture elements across the Galactic thin disk using Cepheids*. A&A **586**, A125 (2016)
- Dark Energy Survey Collaboration, Abbott, T., Abdalla, F. B., et al.: *The Dark Energy Survey: more than dark energy - an overview*. MNRAS **460**, 1270 (2016)
- de Haan, T., Benson, B. A., Bleem, L. E., et al.: *Cosmological Constraints from Galaxy Clusters in the 2500 Square-degree SPT-SZ Survey*. ApJ **832**, 95 (2016)
- Desai, S., Mohr, J. J., Bertin, E., et al.: *Detection and removal of artifacts in astronomical images*. Astronomy and Computing **16**, 67 (2016)
- Dolag, K., Komatsu, E., Sunyaev, R.: *SZ effects in the Magneticum Pathfinder simulation: comparison with the Planck, SPT, and ACT results*. MNRAS **463**, 1797 (2016)
- Elahi, P. J., Knebe, A., Pearce, F. R., et al.: *nIFTY galaxy cluster simulations - III. The similarity and diversity of galaxies and subhaloes*. MNRAS **458**, 1096 (2016)
- English, W., Hardcastle, M. J., Krause, M. G. H.: *Numerical modelling of the lobes of radio galaxies in cluster environments - III. Powerful relativistic and non-relativistic jets*. MNRAS **461**, 2025 (2016)
- Ercolano, B., Owen, J. E.: *Blueshifted [O I] lines from protoplanetary discs: the smoking gun of X-ray photoevaporation*. MNRAS **460**, 3472 (2016)

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