## Mark Vogelsberger

List of Publications by Year in descending order

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#	Article	IF	CITATIONS
1	Introducing the Illustris Project: simulating the coevolution of dark and visible matter in the Universe. Monthly Notices of the Royal Astronomical Society, 2014, 444, 1518-1547.	4.4	1,694
2	The Aquarius Project: the subhaloes of galactic haloes. Monthly Notices of the Royal Astronomical Society, 2008, 391, 1685-1711.	4.4	1,462
3	Simulating galaxy formation with the IllustrisTNG model. Monthly Notices of the Royal Astronomical Society, 2018, 473, 4077-4106.	4.4	1,144
4	First results from the IllustrisTNG simulations: matter and galaxy clustering. Monthly Notices of the Royal Astronomical Society, 2018, 475, 676-698.	4.4	1,035
5	First results from the IllustrisTNG simulations: the stellar mass content of groups and clusters of galaxies. Monthly Notices of the Royal Astronomical Society, 2018, 475, 648-675.	4.4	983
6	Properties of galaxies reproduced by a hydrodynamic simulation. Nature, 2014, 509, 177-182.	27.8	979
7	First results from the IllustrisTNG simulations: the galaxy colour bimodality. Monthly Notices of the Royal Astronomical Society, 2018, 475, 624-647.	4.4	894
8	Introducing the Illustris project: the evolution of galaxy populations across cosmic time. Monthly Notices of the Royal Astronomical Society, 2014, 445, 175-200.	4.4	805
9	First results from the IllustrisTNG simulations: a tale of two elements – chemical evolution of magnesium and europium. Monthly Notices of the Royal Astronomical Society, 2018, 477, 1206-1224.	4.4	746
10	Simulating galaxy formation with black hole driven thermal and kinetic feedback. Monthly Notices of the Royal Astronomical Society, 2017, 465, 3291-3308.	4.4	725
11	A model for cosmological simulations of galaxy formation physics. Monthly Notices of the Royal Astronomical Society, 2013, 436, 3031-3067.	4.4	711
12	The IllustrisTNG simulations: public data release. Computational Astrophysics and Cosmology, 2019, 6,	22.7	698
13	First results from the IllustrisTNG simulations: radio haloes and magnetic fields. Monthly Notices of the Royal Astronomical Society, 0, , .	4.4	643
14	The diversity and similarity of simulated cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2010, 402, 21-34.	4.4	639
15	First results from the TNG50 simulation: galactic outflows driven by supernovae and black hole feedback. Monthly Notices of the Royal Astronomical Society, 2019, 490, 3234-3261.	4.4	510
16	The merger rate of galaxies in the Illustris simulation: a comparison with observations and semi-empirical models. Monthly Notices of the Royal Astronomical Society, 2015, 449, 49-64.	4.4	472
17	First results from the TNG50 simulation: the evolution of stellar and gaseous discs across cosmic time. Monthly Notices of the Royal Astronomical Society, 2019, 490, 3196-3233.	4.4	453
18	The Illustris simulation: the evolving population of black holes across cosmic time. Monthly Notices of the Royal Astronomical Society, 2015, 452, 575-596.	4.4	452

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19	Subhaloes in self-interacting galactic dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2012, 423, 3740-3752.	4.4	431
20	The illustris simulation: Public data release. Astronomy and Computing, 2015, 13, 12-37.	1.7	412
21	Constraining self-interacting dark matter with the Milky Way's dwarf spheroidals. Monthly Notices of the Royal Astronomical Society: Letters, 2013, 431, L20-L24.	3.3	326
22	The stellar mass assembly of galaxies in the Illustris simulation: growth by mergers and the spatial distribution of accreted stars. Monthly Notices of the Royal Astronomical Society, 2016, 458, 2371-2390.	4.4	319
23	Cosmological simulations of galaxy formation. Nature Reviews Physics, 2020, 2, 42-66.	26.6	317
24	Moving mesh cosmology: tracing cosmological gas accretion. Monthly Notices of the Royal Astronomical Society, 2013, 429, 3353-3370.	4.4	288
25	Supermassive black holes and their feedback effects in the IllustrisTNG simulation. Monthly Notices of the Royal Astronomical Society, 2018, 479, 4056-4072.	4.4	270
26	A model for cosmological simulations of galaxy formation physics: multi-epoch validation. Monthly Notices of the Royal Astronomical Society, 2014, 438, 1985-2004.	4.4	242
27	The optical morphologies of galaxies in the IllustrisTNG simulation: a comparison to Pan-STARRS observations. Monthly Notices of the Royal Astronomical Society, 2019, 483, 4140-4159.	4.4	236
28	Prospects for detecting supersymmetric dark matter in the Galactic halo. Nature, 2008, 456, 73-76.	27.8	208
29	Galaxy formation with BECDM – I. Turbulence and relaxation of idealized haloes. Monthly Notices of the Royal Astronomical Society, 2017, 471, 4559-4570.	4.4	208
30	Phase-space structure in the local dark matter distribution and its signature in direct detection experiments. Monthly Notices of the Royal Astronomical Society, 2009, 395, 797-811.	4.4	202
31	The star formation main sequence and stellar mass assembly of galaxies in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2015, 447, 3548-3563.	4.4	201
32	The size evolution of star-forming and quenched galaxies in the IllustrisTNG simulation. Monthly Notices of the Royal Astronomical Society, 2018, 474, 3976-3996.	4.4	195
33	SELF-PERPETUATING SPIRAL ARMS IN DISK GALAXIES. Astrophysical Journal, 2013, 766, 34.	4.5	193
34	The formation of massive, compact galaxies at zÂ=Â2 in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2015, 449, 361-372.	4.4	187
35	ETHOS – an effective theory of structure formation: dark matter physics as a possible explanation of the small-scale CDM problems. Monthly Notices of the Royal Astronomical Society, 2016, 460, 1399-1416.	4.4	185
36	The star formation activity of IllustrisTNG galaxies: main sequence, UVJ diagram, quenched fractions, and systematics. Monthly Notices of the Royal Astronomical Society, 2019, 485, 4817-4840.	4.4	176

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37	GALACTIC ANGULAR MOMENTUM IN THE ILLUSTRIS SIMULATION: FEEDBACK AND THE HUBBLE SEQUENCE. Astrophysical Journal Letters, 2015, 804, L40.	8.3	174
38	Moving mesh cosmology: numerical techniques and global statistics. Monthly Notices of the Royal Astronomical Society, 2012, 425, 3024-3057.	4.4	169
39	Dwarf galaxies in CDM and SIDM with baryons: observational probes of the nature of dark matter. Monthly Notices of the Royal Astronomical Society, 2014, 444, 3684-3698.	4.4	166
40	Galaxy morphology and star formation in the Illustris Simulation at <i>z</i> Â=Â0. Monthly Notices of the Royal Astronomical Society, 2015, 454, 1886-1908.	4.4	155
41	ETHOS—an effective theory of structure formation: From dark particle physics to the matter distribution of the Universe. Physical Review D, 2016, 93, .	4.7	155
42	Moving mesh cosmology: the hydrodynamics of galaxy formation. Monthly Notices of the Royal Astronomical Society, 2012, 424, 2999-3027.	4.4	144
43	Ingredients for 21 cm Intensity Mapping. Astrophysical Journal, 2018, 866, 135.	4.5	139
44	Numerical simulations of the dark universe: State of the art and the next decade. Physics of the Dark Universe, 2012, 1, 50-93.	4.9	137
45	The role of mergers and halo spin in shaping galaxy morphology. Monthly Notices of the Royal Astronomical Society, 2017, 467, 3083-3098.	4.4	134
46	The abundance, distribution, and physical nature of highly ionized oxygen O vi, O vii, and O viii in IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 2018, 477, 450-479.	4.4	133
47	The shape of dark matter haloes in the Aquarius simulations: evolution and memory. Monthly Notices of the Royal Astronomical Society, 2011, 416, 1377-1391.	4.4	132
48	Dust formation in Milky Way-like galaxies. Monthly Notices of the Royal Astronomical Society, 2016, 457, 3775-3800.	4.4	127
49	The relationship between black hole mass and galaxy properties: examining the black hole feedback model in IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 2020, 493, 1888-1906.	4.4	127
50	Assembly history and structure of galactic cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2011, 413, 1373-1382.	4.4	125
51	The evolution of the mass-metallicity relation and its scatter in IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 0, , .	4.4	123
52	The impact of feedback on cosmological gas accretion. Monthly Notices of the Royal Astronomical Society, 2015, 448, 59-74.	4.4	120
53	Baryons in the Cosmic Web of IllustrisTNG – I: gas in knots, filaments, sheets, and voids. Monthly Notices of the Royal Astronomical Society, 2019, 486, 3766-3787.	4.4	120
54	Halo mass and assembly history exposed in the faint outskirts: the stellar and dark matter haloes of Illustris galaxies. Monthly Notices of the Royal Astronomical Society, 2014, 444, 237-249.	4.4	117

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55	Moving-mesh cosmology: characteristics of galaxies and haloes. Monthly Notices of the Royal Astronomical Society, 2012, 425, 2027-2048.	4.4	116
56	Simulating the dust content of galaxies: successes and failures. Monthly Notices of the Royal Astronomical Society, 2017, 468, 1505-1521.	4.4	109
57	Spreading out and staying sharp – creating diverse rotation curves via baryonic and self-interaction effects. Monthly Notices of the Royal Astronomical Society, 2017, 468, 2283-2295.	4.4	109
58	Morphology and star formation in IllustrisTNG: the build-up of spheroids and discs. Monthly Notices of the Royal Astronomical Society, 2019, 487, 5416-5440.	4.4	109
59	Following the flow: tracer particles in astrophysical fluid simulations. Monthly Notices of the Royal Astronomical Society, 2013, 435, 1426-1442.	4.4	107
60	Synthetic galaxy images and spectra from the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2015, 447, 2753-2771.	4.4	106
61	Damped Lyman α absorbers as a probe of stellar feedback. Monthly Notices of the Royal Astronomical Society, 2014, 445, 2313-2324.	4.4	105
62	Jellyfish galaxies with the IllustrisTNG simulations – I. Gas-stripping phenomena in the full cosmological context. Monthly Notices of the Royal Astronomical Society, 2019, 483, 1042-1066.	4.4	102
63	Resolving small-scale cold circumgalactic gas in TNG50. Monthly Notices of the Royal Astronomical Society, 2020, 498, 2391-2414.	4.4	100
64	Ejective and preventative: the IllustrisTNG black hole feedback and its effects on the thermodynamics of the gas within and around galaxies. Monthly Notices of the Royal Astronomical Society, 2020, 499, 768-792.	4.4	100
65	High-redshift <i>JWST</i> predictions from IllustrisTNG: dust modelling and galaxy luminosity functions. Monthly Notices of the Royal Astronomical Society, 2020, 492, 5167-5201.	4.4	99
66	The fraction of dark matter within galaxies from the IllustrisTNG simulations. Monthly Notices of the Royal Astronomical Society, 2018, 481, 1950-1975.	4.4	97
67	The diverse evolutionary paths of simulated high- <i>z</i> massive, compact galaxies to <i>z</i> = 0. Monthly Notices of the Royal Astronomical Society, 2016, 456, 1030-1048.	4.4	96
68	Streams and caustics: the fine-grained structure of $\hat{I}$ cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2011, 413, 1419-1438.	4.4	95
69	First Star-Forming Structures in Fuzzy Cosmic Filaments. Physical Review Letters, 2019, 123, 141301.	7.8	94
70	The fine-grained phase-space structure of cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 0, 385, 236-254.	4.4	93
71	Moving-mesh cosmology: properties of gas discs. Monthly Notices of the Royal Astronomical Society, 2012, 427, 2224-2238.	4.4	92
72	HOT X-RAY CORONAE AROUND MASSIVE SPIRAL GALAXIES: A UNIQUE PROBE OF STRUCTURE FORMATION MODELS. Astrophysical Journal, 2013, 772, 97.	4.5	92

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73	Scattering, damping, and acoustic oscillations: Simulating the structure of dark matter halos with relativistic force carriers. Physical Review D, 2014, 90, .	4.7	91
74	Recoiling black holes: prospects for detection and implications of spin alignment. Monthly Notices of the Royal Astronomical Society, 2016, 456, 961-989.	4.4	90
75	THE CATERPILLAR PROJECT: A LARGE SUITE OF MILKY WAY SIZED HALOS. Astrophysical Journal, 2016, 818, 10.	4.5	88
76	Introducing the <scp>thesan</scp> project: radiation-magnetohydrodynamic simulations of the epoch of reionization. Monthly Notices of the Royal Astronomical Society, 2022, 511, 4005-4030.	4.4	88
77	Galaxy mergers on a moving mesh: a comparison with smoothed particle hydrodynamics. Monthly Notices of the Royal Astronomical Society, 2014, 442, 1992-2016.	4.4	87
78	Simulating galactic dust grain evolution on a moving mesh. Monthly Notices of the Royal Astronomical Society, 2018, 478, 2851-2886.	4.4	87
79	QUASI-RESONANT THEORY OF TIDAL INTERACTIONS. Astrophysical Journal, 2010, 725, 353-368.	4.5	86
80	Quenched fractions in the IllustrisTNG simulations: the roles of AGN feedback, environment, and pre-processing. Monthly Notices of the Royal Astronomical Society, 2020, 500, 4004-4024.	4.4	86
81	The impact of galactic feedback on the circumgalactic medium. Monthly Notices of the Royal Astronomical Society, 2015, 448, 895-909.	4.4	82
82	Zooming in on accretion – I. The structure of halo gas. Monthly Notices of the Royal Astronomical Society, 2016, 460, 2881-2904.	4.4	80
83	Reproducing the kinematics of damped Lyman $\hat{I}\pm$ systems. Monthly Notices of the Royal Astronomical Society, 2015, 447, 1834-1846.	4.4	77
84	Similar star formation rate and metallicity variability time-scales drive the fundamental metallicity relation. Monthly Notices of the Royal Astronomical Society: Letters, 2018, 477, L16-L20.	3.3	75
85	Atomic hydrogen in IllustrisTNG galaxies: the impact of environment parallelled with local 21-cm surveys. Monthly Notices of the Royal Astronomical Society, 2019, 483, 5334-5354.	4.4	75
86	Simulating the interstellar medium and stellar feedback on a moving mesh: implementation and isolated galaxies. Monthly Notices of the Royal Astronomical Society, 2019, 489, 4233-4260.	4.4	72
87	Lens galaxies in the Illustris simulation: power-law models and the bias of the Hubble constant from time delays. Monthly Notices of the Royal Astronomical Society, 2016, 456, 739-755.	4.4	71
88	The uniformity and time-invariance of the intra-cluster metal distribution in galaxy clusters from the IllustrisTNG simulations. Monthly Notices of the Royal Astronomical Society, 2018, 474, 2073-2093.	4.4	71
89	Modeling the Atomic-to-molecular Transition in Cosmological Simulations of Galaxy Formation. Astrophysical Journal, Supplement Series, 2018, 238, 33.	7.7	71
90	Shape of dark matter haloes in the Illustris simulation: effects of baryons. Monthly Notices of the Royal Astronomical Society, 2019, 484, 476-493.	4.4	71

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91	<scp>arepo-rt</scp> : radiation hydrodynamics on a moving mesh. Monthly Notices of the Royal Astronomical Society, 2019, 485, 117-149.	4.4	69
92	The physics of multiphase gas flows: fragmentation of a radiatively cooling gas cloud in a hot wind. Monthly Notices of the Royal Astronomical Society, 2019, 482, 5401-5421.	4.4	69
93	A census of cool-core galaxy clusters in IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 2018, 481, 1809-1831.	4.4	68
94	An analysis of the evolving comoving number density of galaxies in hydrodynamical simulations. Monthly Notices of the Royal Astronomical Society, 2015, 454, 2770-2786.	4.4	67
95	On the assembly of dwarf galaxies in clusters and their efficient formation of globular clusters. Monthly Notices of the Royal Astronomical Society, 2016, 455, 2323-2336.	4.4	67
96	Atomic and molecular gas in IllustrisTNG galaxies at low redshift. Monthly Notices of the Royal Astronomical Society, 2019, 487, 1529-1550.	4.4	67
97	Quenched fractions in the IllustrisTNG simulations: comparison with observations and other theoretical models. Monthly Notices of the Royal Astronomical Society, 2021, 506, 4760-4780.	4.4	66
98	A Quantification of the Butterfly Effect in Cosmological Simulations and Implications for Galaxy Scaling Relations. Astrophysical Journal, 2019, 871, 21.	4.5	65
99	The ALMA Spectroscopic Survey in the HUDF: the Molecular Gas Content of Galaxies and Tensions with IllustrisTNG and the Santa Cruz SAM. Astrophysical Journal, 2019, 882, 137.	4.5	65
100	Mapping substructure in the HST Frontier Fields cluster lenses and in cosmological simulations. Monthly Notices of the Royal Astronomical Society, 2017, 468, 1962-1980.	4.4	64
101	Supermassive black holes in cosmological simulations I: <i>M</i> BH â^' <i>M</i> â<† relation and black hole mass function. Monthly Notices of the Royal Astronomical Society, 2021, 503, 1940-1975.	4.4	63
102	The inner structure of early-type galaxies in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2017, 469, 1824-1848.	4.4	62
103	Disruption of giant molecular clouds and formation of bound star clusters under the influence of momentum stellar feedback. Monthly Notices of the Royal Astronomical Society, 2019, 487, 364-380.	4.4	62
104	Direct detection of self-interacting dark matter. Monthly Notices of the Royal Astronomical Society, 2013, 430, 1722-1735.	4.4	60
105	The large-scale properties of simulated cosmological magnetic fields. Monthly Notices of the Royal Astronomical Society, 2015, 453, 4000-4020.	4.4	60
106	Large-scale mass distribution in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2016, 457, 3024-3035.	4.4	60
107	The colours of satellite galaxies in the Illustris simulation. Monthly Notices of the Royal Astronomical Society: Letters, 2015, 447, L6-L10.	3.3	59
108	Revealing the galaxy–halo connection in IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 2019, 490, 5693-5711.	4.4	59

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109	Linking galaxy structural properties and star formation activity to black hole activity with IllustrisTNG. Monthly Notices of the Royal Astronomical Society, 2019, 484, 4413-4443.	4.4	59
110	Secondary infall and the pseudo-phase-space density profiles of cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2010, 406, 137-146.	4.4	58
111	On the OVI abundance in the circumgalactic medium of low-redshift galaxies. Monthly Notices of the Royal Astronomical Society, 2017, 465, 2966-2982.	4.4	58
112	Predictions for the angular dependence of gas mass flow rate and metallicity in the circumgalactic medium. Monthly Notices of the Royal Astronomical Society, 2020, 499, 2462-2473.	4.4	58
113	Galaxy formation with BECDM – II. Cosmic filaments and first galaxies. Monthly Notices of the Royal Astronomical Society, 2020, 494, 2027-2044.	4.4	58
114	Enhanced tidal stripping of satellites in the galactic halo from dark matter self-interactions. Monthly Notices of the Royal Astronomical Society, 2016, 461, 710-727.	4.4	57
115	The <scp>hestia</scp> project: simulations of the Local Group. Monthly Notices of the Royal Astronomical Society, 2020, 498, 2968-2983.	4.4	56
116	Spatially resolved star formation and inside-out quenching in the TNG50 simulation and 3D-HST observations. Monthly Notices of the Royal Astronomical Society, 2021, 508, 219-235.	4.4	56
117	Intrinsic alignments of galaxies in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2017, 468, 790-823.	4.4	55
118	A Deep Learning Approach to Galaxy Cluster X-Ray Masses. Astrophysical Journal, 2019, 876, 82.	4.5	55
119	The fate of disc galaxies in IllustrisTNG clusters. Monthly Notices of the Royal Astronomical Society, 2020, 496, 2673-2703.	4.4	53
120	Moving-mesh cosmology: properties of neutral hydrogen in absorption. Monthly Notices of the Royal Astronomical Society, 2013, 429, 3341-3352.	4.4	52
121	Self-Interacting Dark Matter Subhalos in the MilkyÂWay's Tides. Physical Review Letters, 2020, 124, 141102.	7.8	52
122	The Hubble Sequence at z â^1⁄4 0 in the IllustrisTNG simulation with deep learning. Monthly Notices of the Royal Astronomical Society, 2019, 489, 1859-1879.	4.4	51
123	Characterization of dark-matter-induced anisotropies in the diffuse gamma-ray background. Monthly Notices of the Royal Astronomical Society, 2013, 429, 1529-1553.	4.4	49
124	A discontinuous Galerkin method for solving the fluid and magnetohydrodynamic equations in astrophysical simulations. Monthly Notices of the Royal Astronomical Society, 2014, 437, 397-414.	4.4	49
125	Probing the Hot X-Ray Corona around the Massive Spiral Galaxy, NGC 6753, Using Deep XMM-Newton Observations. Astrophysical Journal, 2017, 850, 98.	4.5	49
126	Caustics in growing cold dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2009, 400, 2174-2184.	4.4	47

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127	Diverse dark matter density at sub-kiloparsec scales in MilkyÂWay satellites: Implications for the nature of dark matter. Physical Review D, 2019, 100, .	4.7	47
128	The impact of baryonic discs on the shapes and profiles of self-interacting dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2018, 479, 359-367.	4.4	46
129	Evaporating the Milky Way halo and its satellites with inelastic self-interacting dark matter. Monthly Notices of the Royal Astronomical Society, 2019, 484, 5437-5452.	4.4	46
130	Hydrogen reionization in the Illustris universe. Monthly Notices of the Royal Astronomical Society, 2015, 453, 3594-3611.	4.4	44
131	Galaxy mergers moulding the circum-galactic medium – I. The impact of a major merger. Monthly Notices of the Royal Astronomical Society, 2018, 475, 1160-1176.	4.4	44
132	X-ray signatures of black hole feedback: hot galactic atmospheres in IllustrisTNG and X-ray observations. Monthly Notices of the Royal Astronomical Society, 2020, 494, 549-570.	4.4	44
133	The <scp>thesan</scp> project: properties of the intergalactic medium and its connection to reionization-era galaxies. Monthly Notices of the Royal Astronomical Society, 2022, 512, 4909-4933.	4.4	44
134	An instability of feedback-regulated star formation in galactic nuclei. Monthly Notices of the Royal Astronomical Society, 2017, 467, 2301-2314.	4.4	42
135	Subhalo demographics in the Illustris simulation: effects of baryons and halo-to-halo variation. Monthly Notices of the Royal Astronomical Society, 2017, 472, 4343-4360.	4.4	42
136	ETHOS – an effective theory of structure formation: predictions for the high-redshift Universe – abundance of galaxies and reionization. Monthly Notices of the Royal Astronomical Society, 2018, 477, 2886-2899.	4.4	42
137	The abundance of satellites around Milky Way- and M31-like galaxies with the TNG50 simulation: a matter of diversity. Monthly Notices of the Royal Astronomical Society, 2021, 507, 4211-4240.	4.4	41
138	HOT GASEOUS CORONAE AROUND SPIRAL GALAXIES: PROBING THE ILLUSTRIS SIMULATION. Astrophysical Journal, 2015, 804, 72.	4.5	40
139	A moving mesh unstaggered constrained transport scheme for magnetohydrodynamics. Monthly Notices of the Royal Astronomical Society, 2016, 463, 477-488.	4.4	40
140	Effects of simulated cosmological magnetic fields on the galaxy population. Monthly Notices of the Royal Astronomical Society: Letters, 2015, 456, L69-L73.	3.3	40
141	Increasing Black Hole Feedback-induced Quenching with Anisotropic Thermal Conduction. Astrophysical Journal Letters, 2017, 837, L18.	8.3	40
142	Cas-phase metallicity gradients of TNG50 star-forming galaxies. Monthly Notices of the Royal Astronomical Society, 2021, 506, 3024-3048.	4.4	40
143	Separate Universe simulations with IllustrisTNG: baryonic effects on power spectrum responses and higher-order statistics. Monthly Notices of the Royal Astronomical Society, 2019, 488, 2079-2092.	4.4	39
144	Modelling galactic conformity with the colour–halo age relation in the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2016, 455, 185-198.	4.4	38

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145	Dust in and around galaxies: dust in cluster environments and its impact on gas cooling. Monthly Notices of the Royal Astronomical Society, 2019, 487, 4870-4883.	4.4	38
146	Automated distant galaxy merger classifications from Space Telescope images using the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2019, 486, 3702-3720.	4.4	38
147	The physical origins and dominant emission mechanisms of Lyman alpha haloes: results from the TNG50 simulation in comparison to MUSE observations. Monthly Notices of the Royal Astronomical Society, 2021, 506, 5129-5152.	4.4	38
148	A deep learning approach to test the small-scale galaxy morphology and its relationship with star formation activity in hydrodynamical simulations. Monthly Notices of the Royal Astronomical Society, 2021, 501, 4359-4382.	4.4	38
149	A constrained transport scheme for MHD on unstructured static and moving meshes. Monthly Notices of the Royal Astronomical Society, 2014, 442, 43-55.	4.4	37
150	The dust-continuum size of TNG50 galaxies at <i>z</i> Â= 1–5: a comparison with the distribution of stellar light, stars, dust, and H2. Monthly Notices of the Royal Astronomical Society, 2022, 510, 3321-3334.	4.4	37
151	A rumble in the dark: signatures of self-interacting dark matter in supermassive black hole dynamics and galaxy density profiles. Monthly Notices of the Royal Astronomical Society, 2017, 469, 2845-2854.	4.4	36
152	The <scp>thesan</scp> project: Lyman-α emission and transmission during the Epoch of Reionization. Monthly Notices of the Royal Astronomical Society, 2022, 512, 3243-3265.	4.4	36
153	THE EFFECTS OF PATCHY REIONIZATION ON SATELLITE GALAXIES OF THE MILKY WAY. Astrophysical Journal, 2012, 746, 109.	4.5	35
154	The structure and assembly history of cluster-sized haloes in self-interacting dark matter. Monthly Notices of the Royal Astronomical Society, 2018, 474, 746-759.	4.4	35
155	The interplay of self-interacting dark matter and baryons in shaping the halo evolution. Monthly Notices of the Royal Astronomical Society, 2019, 484, 4563-4573.	4.4	35
156	Gravitational lensing and the power spectrum of dark matter substructure: Insights from the ETHOS <mml:math <br="" xmlns:mml="http://www.w3.org/1998/Math/MathML">display="inline"&gt;<mml:mi>N</mml:mi></mml:math> -body simulations. Physical Review D, 2018, 98, .	4.7	32
157	The cumulative star formation histories of dwarf galaxies with TNG50. I: environment-driven diversity and connection to quenching. Monthly Notices of the Royal Astronomical Society, 2021, 508, 1652-1674.	4.4	32
158	Quiescent ultra-diffuse galaxies in the field originating from backsplash orbits. Nature Astronomy, 2021, 5, 1255-1260.	10.1	32
159	The distinct stellar-to-halo mass relations of satellite and central galaxies: insights from the IllustrisTNG simulations. Monthly Notices of the Royal Astronomical Society, 2020, 500, 3957-3975.	4.4	32
160	The mass profile of the Milky Way to the virial radius from the Illustris simulation. Monthly Notices of the Royal Astronomical Society, 2016, 461, 3483-3493.	4.4	31
161	High-redshift <i>JWST</i> predictions from IllustrisTNG: II. Galaxy line and continuum spectral indices and dust attenuation curves. Monthly Notices of the Royal Astronomical Society, 2020, 495, 4747-4768.	4.4	31
162	A missing outskirts problem? Comparisons between stellar haloes in the Dragonfly Nearby Galaxies Survey and the TNG100 simulation. Monthly Notices of the Royal Astronomical Society, 2020, 495, 4570-4604.	4.4	31

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163	The <scp>thesan</scp> project: predictions for multitracer line intensity mapping in the epoch of reionization. Monthly Notices of the Royal Astronomical Society, 2022, 514, 3857-3878.	4.4	31
164	Accurately simulating anisotropic thermal conduction on a moving mesh. Monthly Notices of the Royal Astronomical Society, 2016, 458, 410-424.	4.4	30
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