## Dominik R G Schleicher

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/7009273/publications.pdf

Version: 2024-02-01

62 papers 2,084 citations

23 h-index

279701

233338 45 g-index

62 all docs

62 docs citations

62 times ranked 1953 citing authors

#	Article	IF	CITATIONS
1	A NEW JEANS RESOLUTION CRITERION FOR (M)HD SIMULATIONS OF SELF-GRAVITATING GAS: APPLICATION TO MAGNETIC FIELD AMPLIFICATION BY GRAVITY-DRIVEN TURBULENCE. Astrophysical Journal, 2011, 731, 62.	1.6	274
2	The First Magnetic Fields. Space Science Reviews, 2012, 166, 37-70.	3.7	191
3	Massive black hole factories: Supermassive and quasi-star formation in primordial halos. Astronomy and Astrophysics, 2013, 558, A59.	2.1	127
4	THE SMALL-SCALE DYNAMO AND NON-IDEAL MAGNETOHYDRODYNAMICS IN PRIMORDIAL STAR FORMATION. Astrophysical Journal, 2012, 754, 99.	1.6	119
5	THE TURBULENT DYNAMO IN HIGHLY COMPRESSIBLE SUPERSONIC PLASMAS. Astrophysical Journal Letters, 2014, 797, L19.	3.0	94
6	A new interpretation of the far-infrared $\hat{a}\in$ radio correlation and the expected breakdown at high redshift. Astronomy and Astrophysics, 2013, 556, A142.	2.1	90
7	Magnetic field amplification by small-scale dynamo action: Dependence on turbulence models and Reynolds and Prandtl numbers. Physical Review E, 2012, 85, 026303.	0.8	78
8	BLACK HOLE FORMATION IN PRIMORDIAL GALAXIES: CHEMICAL AND RADIATIVE CONDITIONS. Astrophysical Journal Letters, 2010, 712, L69-L72.	3.0	73
9	Magnetic field amplification during gravitational collapse - influence of turbulence, rotation and gravitational compression. Monthly Notices of the Royal Astronomical Society, 2012, 423, 3148-3162.	1.6	68
10	Atypical Mg-poor Milky Way Field Stars with Globular Cluster Second-generation-like Chemical Patterns. Astrophysical Journal Letters, 2017, 846, L2.	3.0	66
11	Reionization: A probe for the stellar population and the physics of the early universe. Physical Review D, 2008, 78, .	1.6	59
12	THE INFLUENCE OF MAGNETIC FIELDS ON THE THERMODYNAMICS OF PRIMORDIAL STAR FORMATION. Astrophysical Journal, 2009, 703, 1096-1106.	1.6	56
13	Planet formation from the ejecta of common envelopes. Astronomy and Astrophysics, 2014, 563, A61.	2.1	52
14	The small-scale dynamo: breaking universality at high Mach numbers. New Journal of Physics, 2013, 15, 023017.	1.2	42
15	THE FORMATION OF MASSIVE PRIMORDIAL STARS IN THE PRESENCE OF MODERATE UV BACKGROUNDS. Astrophysical Journal, 2014, 792, 78.	1.6	41
16	INFLUENCE OF PRIMORDIAL MAGNETIC FIELDS ON 21 CM EMISSION. Astrophysical Journal, 2009, 692, 236-245.	1.6	37
17	IMPACT OF DUST COOLING ON DIRECT-COLLAPSE BLACK HOLE FORMATION. Astrophysical Journal, 2016, 823, 40.	1.6	37
18	Small-scale dynamo at low magnetic Prandtl numbers. Physical Review E, 2012, 86, 066412.	0.8	32

#	Article	IF	Citations
19	WEAKLY INTERACTING MASSIVE PARTICLE DARK MATTER AND FIRST STARS: SUPPRESSION OF FRAGMENTATION IN PRIMORDIAL STAR FORMATION. Astrophysical Journal, 2012, 761, 154.	1.6	30
20	Magnetic field amplification in accretion discs around the first stars: implications for the primordial IMF. Monthly Notices of the Royal Astronomical Society, 2021, 503, 2014-2032.	1.6	29
21	THE IMPACT OF THERMODYNAMICS ON GRAVITATIONAL COLLAPSE: FILAMENT FORMATION AND MAGNETIC FIELD AMPLIFICATION. Astrophysical Journal Letters, 2012, 760, L28.	3.0	27
22	Dark stars: Implications and constraints from cosmic reionization and extragalactic background radiation. Physical Review D, 2009, 79, .	1.6	26
23	The effect of non-equilibrium metal cooling on the interstellar medium. Monthly Notices of the Royal Astronomical Society, 2018, 475, 3283-3304.	1.6	23
24	Formation of supermassive black hole seeds in nuclear star clusters via gas accretion and runaway collisions. Monthly Notices of the Royal Astronomical Society, 2021, 503, 1051-1069.	1.6	23
25	Magnetic field amplification by the small-scale dynamo in the early Universe. Physical Review D, 2014, $89$ , .	1.6	21
26	Low-metallicity star formation: relative impact of metals and magnetic fields. Monthly Notices of the Royal Astronomical Society, 2014, 442, 3112-3126.	1.6	21
27	FORMATION OF CARBON-ENHANCED METAL-POOR STARS IN THE PRESENCE OF FAR-ULTRAVIOLET RADIATION. Astrophysical Journal Letters, 2014, 790, L35.	3.0	21
28	Star-forming dwarf galaxies: the correlation between far-infrared and radio fluxes. Astronomy and Astrophysics, 2016, 593, A77.	2.1	21
29	A nonlinear structural subgrid-scale closure for compressible MHD. II. <i>A priori</i> comparison on turbulence simulation data. Physics of Plasmas, 2016, 23, .	0.7	21
30	Deuterium fractionation and H2D+ evolution in turbulent and magnetized cloud cores. Monthly Notices of the Royal Astronomical Society, 2017, 469, 2602-2625.	1.6	21
31	Primordial magnetic field constraints from the end of reionization. Monthly Notices of the Royal Astronomical Society: Letters, 2011, 418, L143-L147.	1.2	18
32	The 3D Structure of CO Depletion in High-mass Prestellar Regions. Astrophysical Journal, 2019, 887, 224.	1.6	18
33	The Role of Gas Fragmentation During the Formation of Supermassive Black Holes. Astrophysical Journal, 2019, 885, 127.	1.6	18
34	Nonlinear closures for scale separation in supersonic magnetohydrodynamic turbulence. New Journal of Physics, 2015, 17, 023070.	1.2	17
35	A nonlinear structural subgrid-scale closure for compressible MHD. I. Derivation and energy dissipation properties. Physics of Plasmas, 2016, 23, 062316.	0.7	17
36	Radiation hydrodynamical simulations of the birth of intermediate-mass black holes in the first galaxies. Monthly Notices of the Royal Astronomical Society, 2021, 508, 1756-1767.	1.6	17

#	Article	IF	Citations
37	Comparative statistics of selected subgrid-scale models in large-eddy simulations of decaying, supersonic magnetohydrodynamic turbulence. Physical Review E, 2017, 95, 033206.	0.8	16
38	A dynamo mechanism as the potential origin of the long cycle in double periodic variables. Astronomy and Astrophysics, 2017, 602, A109.	2.1	16
39	H <sub>2</sub> Ortho-to-para Conversion on Grains: A Route to Fast Deuterium Fractionation in Dense Cloud Cores?. Astrophysical Journal Letters, 2017, 849, L25.	3.0	16
40	Lyman $\hat{l}_{\pm}$ emission from the first galaxies: signatures of accretion and infall in the presence of line trapping. Monthly Notices of the Royal Astronomical Society: Letters, 2011, 413, L33-L37.	1.2	15
41	Magnetic tension and instabilities in the Orion A integral-shaped filament. Monthly Notices of the Royal Astronomical Society, 2018, 475, 121-127.	1.6	15
42	Star formation and accretion in the circumnuclear disks of active galaxies. Astronomy and Astrophysics, 2013, 560, A34.	2.1	13
43	Modeling gravitational instabilities in self-gravitating protoplanetary disks with adaptive mesh refinement techniques. Astronomy and Astrophysics, 2015, 579, A32.	2.1	10
44	The Formation of Supermassive Black Holes in the First Galaxies. , 2010, , .		9
45	Effect of mass-loss due to stellar winds on the formation of supermassive black hole seeds in dense nuclear star clusters. Monthly Notices of the Royal Astronomical Society, 2021, 505, 2186-2194.	1.6	8
46	Magnetic fields during galaxy mergers. Astronomy and Astrophysics, 2016, 593, A89.	2.1	8
47	Cosmic constraints rule out s-wave annihilation of light dark matter. Physical Review D, 2009, 79, .	1.6	6
48	The chemical evolution of self-gravitating primordial disks. Astronomy and Astrophysics, 2016, 585, All.	2.1	5
49	Evidence of Active Regions in the Donor of the Algol-type Binary V393 Scorpii and Test for the Dynamo Model of its Long Cycle. Publications of the Astronomical Society of the Pacific, 2018, 130, 094203.	1.0	5
50	Turbulent gas accretion between supermassive black-holes and star-forming rings in the circumnuclear disk. Astronomy and Astrophysics, 2017, 602, A84.	2.1	4
51	Formation of Population II Star Clusters in the Aftermath of a Pair Instability Supernova. Astrophysical Journal Letters, 2020, 902, L31.	3.0	4
52	The First Magnetic Fields. Space Sciences Series of ISSI, 2011, , 37-70.	0.0	3
53	Stellar and Accretion Disk Parameters of the Close Binary HD 50526. Astronomical Journal, 2021, 162, 66.	1.9	2
54	Origin of eclipsing time variations: Contributions of different modes of the dynamo-generated magnetic field. Astronomy and Astrophysics, 2022, 663, A90.	2.1	2

#	Article	IF	CITATIONS
55	Fundamental Parameters of the Eclipsing Binary DD CMa and Evidence for Mass Exchange. Astronomical Journal, 2021, 161, 165.	1.9	1
56	The Fermi paradox: impact of astrophysical processes and dynamical evolution. International Journal of Astrobiology, 0, , 1-14.	0.9	1
57	Detecting the First Quasars with ALMA. Proceedings of the International Astronomical Union, 2009, 5, 52-52.	0.0	O
58	Detecting the first quasars with ALMA. Proceedings of the International Astronomical Union, 2009, 5, 426-426.	0.0	0
59	Primordial Magnetic Fields: Reionization Constraints and Implications for the First Stars. , 2010, , .		O
60	Dark matter annihilation feedback: Effects upon collapse and fragmentation. , 2012, , .		0
61	Small-scale dynamo action in primordial halos. Proceedings of the International Astronomical Union, 2012, 8, 237-248.	0.0	O
62	Synthetic observations using POLARIS: an application to simulations of massive prestellar cores. Astrophysics and Space Science, 2022, 367, .	0.5	0