O W Roberts

List of Publications by Year
in descending order

35 papers	636 citations	687363 13 h-index	610901 24 g-index
50 all docs	50 docs citations	50 times ranked	585 citing authors

#	Article	IF	Citations
1	KINETIC PLASMA TURBULENCE IN THE FAST SOLAR WIND MEASURED BYCLUSTER. Astrophysical Journal, 2013, 769, 58.	4.5	80
2	Turbulence-Driven Ion Beams in the Magnetospheric Kelvin-Helmholtz Instability. Physical Review Letters, 2019, 122, 035102.	7.8	62
3	Coherent Structures at Ion Scales in Fast Solar Wind: Cluster Observations. Astrophysical Journal, 2017, 849, 49.	4.5	60
4	A STATISTICAL STUDY OF THE SOLAR WIND TURBULENCE AT ION KINETIC SCALES USING THEK-FILTERING TECHNIQUE AND CLUSTER DATA. Astrophysical Journal, 2015, 802, 2.	4.5	46
5	EVIDENCE OF THE ION CYCLOTRON RESONANCE AT PROTON KINETIC SCALES IN THE SOLAR WIND. Astrophysical Journal, 2015, 802, 1.	4.5	34
6	Observation of an MHD AlfvÃ©n vortex in the slow solar wind. Journal of Geophysical Research: Space Physics, 2016, 121, 3870-3881.	2.4	30
7	Multipoint analysis of compressive fluctuations in the fast and slow solar wind. Journal of Geophysical Research: Space Physics, 2017, 122, 6940-6963.	2.4	29
8	Variability of the Magnetic Field Power Spectrum in the Solar Wind at Electron Scales. Astrophysical Journal, 2017, 850, 120.	4.5	26
9	Ionâ€Scale Kinetic AlfvÃ©n Turbulence: MMS Measurements of the AlfvÃ©n Ratio in the Magnetosheath. Geophysical Research Letters, 2018, 45, 7974-7984.	4.0	19
10	Cluster and MMS Simultaneous Observations of Magnetosheath High Speed Jets and Their Impact on the Magnetopause. Frontiers in Astronomy and Space Sciences, 2020, 6, .	2.8	18
11	Direct Measurement of Anisotropic and Asymmetric Wave Vector Spectrum in Ion-scale Solar Wind Turbulence. Astrophysical Journal Letters, 2017, 851, L11.	8.3	17
12	Statistical study of linear magnetic hole structures near Earth. Annales Geophysicae, 2021, 39, 239-253.	1.6	16
13	First Observations of the Disruption of the Earth's Foreshock Wave Field During Magnetic Clouds. Geophysical Research Letters, 2019, 46, 12644-12653.	4.0	15
14	Transport Ratios of the Kinetic AlfvÃ©n Mode in Space Plasmas. Frontiers in Physics, 2020, 8, .	2.1	15
15	Anisotropy of the Spectral Index in Ion Scale Compressible Turbulence: MMS Observations in the Magnetosheath. Frontiers in Physics, 2019, 7, .	2.1	13
16	Sub-ion Scale Compressive Turbulence in the Solar Wind: MMS Spacecraft Potential Observations. Astrophysical Journal, Supplement Series, 2020, 250, 35.	7.7	13
17	Magnetosheath Jet Occurrence Rate in Relation to CMEs and SIRs. Journal of Geophysical Research: Space Physics, 2022, 127, .	2.4	13
18	Multi-scale observations of the magnetopause Kelvinâ€“Helmholtz waves during southward IMF. Physics of Plasmas, 2022, 29, .	1.9	12

#	Article	IF	Citations
19	Structure of Electronâ€Scale Plasma Mixing Along the Dayside Reconnection Separatrix. Journal of Geophysical Research: Space Physics, 2019, 124, 8788-8803.	2.4	11
20	Higher-Order Statistics in Compressive Solar Wind Plasma Turbulence: High-Resolution Density Observations From the Magnetospheric MultiScale Mission. Frontiers in Physics, 2020, 8, .	2.1	11
21	A Case for Electron-Astrophysics. Experimental Astronomy, 0, , 1.	3.7	11
22	Validation of the <i>k</i>-filtering technique for a signal composed of random-phase plane waves and non-random coherent structures. Geoscientific Instrumentation, Methods and Data Systems, 2014, 3, 247-254.	1.6	10
23	Multi-scale analysis of compressible fluctuations in the solar wind. Annales Geophysicae, 2018, 36, 47-52.	1.6	9
24	Charging time scales and magnitudes of dust and spacecraft potentials in space plasma scenarios. Physics of Plasmas, 2020, 27, 103704.	1.9	9
25	Possible coexistence of kinetic AlfvÃ©n and ion Bernstein modes in sub-ion scale compressive turbulence in the solar wind. Physical Review Research, 2020, 2, .	3.6	9
26	Three-dimensional density and compressible magnetic structure in solar wind turbulence. Annales Geophysicae, 2018, 36, 527-539.	1.6	8
27	Results from the intercalibration of optical low light calibration sources 2011. Geoscientific Instrumentation, Methods and Data Systems, 2012, 1, 43-51.	1.6	7
28	A Study of the Solar Wind Ion and Electron Measurements From the Magnetospheric Multiscale Mission's Fast Plasma Investigation. Journal of Geophysical Research: Space Physics, 2021, 126, e2021JA029784.	2.4	7
29	Estimation of the Electron Density From Spacecraft Potential During Highâ€Frequency Electric Field Fluctuations. Journal of Geophysical Research: Space Physics, 2020, 125, e2020JA027854.	2.4	6
30	Magnetic Field Reconstruction for a Realistic Multi-Point, Multi-Scale Spacecraft Observatory. Frontiers in Astronomy and Space Sciences, 2021, 8, .	2.8	6
31	Magnetic Reconnection Within the Boundary Layer of a Magnetic Cloud in the Solar Wind. Journal of Geophysical Research: Space Physics, 2021, 126, e2021JA029415.	2.4	6
32	The kinetic AlfvÃ©n-like nature of turbulent fluctuations in the Earth's magnetosheath: MMS measurement of the electron AlfvÃ©n ratio. Physics of Plasmas, 2022, 29, 012308.	1.9	4
33	Wave Activity in a Dynamically Evolving Reconnection Separatrix. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028520.	2.4	2
34	Nature of Electrostatic Fluctuations in the Terrestrial Magnetosheath. Astrophysical Journal, 2021, 919, 75.	4.5	2
35	Atmospheric Drag, Occultation â€˜Nâ€™ Ionospheric Scintillation (ADONIS) mission proposal. Journal of Space Weather and Space Climate, 2015, 5, A2.	3.3	0