Ferdinand Plaschke

List of Publications by Year
in descending order

#	Article	IF	Citations
1	The THEMIS Fluxgate Magnetometer. Space Science Reviews, 2008, 141, 235-264.	8.1	1,050
2	The Magnetospheric Multiscale Magnetometers. Space Science Reviews, 2016, 199, 189-256.	8.1	896
3	The FIELDS Instrument Suite on MMS: Scientific Objectives, Measurements, and Data Products. Space Science Reviews, 2016, 199, 105-135.	8.1	390
4	The Space Physics Environment Data Analysis System (SPEDAS). Space Science Reviews, 2019, 215, 9.	8.1	332
5	A THEMIS multicase study of dipolarization fronts in the magnetotail plasma sheet. Journal of Geophysical Research, 2011, 116, .	3.3	305
6	Jets Downstream of Collisionless Shocks. Space Science Reviews, 2018, 214, 1.	8.1	101
7	Anti-sunward high-speed jets in the subsolar magnetosheath. Annales Geophysicae, 2013, 31, 1877-1889.	1.6	99
8	The role of transient ion foreshock phenomena in driving Pc5 ULF wave activity. Journal of Geophysical Research: Space Physics, 2013, 118, 299-312.	2.4	94
9	Electron scale structures and magnetic reconnection signatures in the turbulent magnetosheath. Geophysical Research Letters, 2016, 43, 5969-5978.	4.0	92
10	Rippled Quasiperpendicular Shock Observed by the Magnetospheric Multiscale Spacecraft. Physical Review Letters, 2016, 117, 165101.	7.8	87
11	Magnetospheric Multiscale Observations of Electron Vortex Magnetic Hole in the Turbulent Magnetosheath Plasma. Astrophysical Journal Letters, 2017, 836, L27.	8.3	85
12	Anomalous magnetosheath flows and distorted subsolar magnetopause for radial interplanetary magnetic fields. Geophysical Research Letters, 2009, 36, .	4.0	81
13	Electron fluxes and pitchâ€angle distributions at dipolarization fronts: THEMIS multipoint observations. Journal of Geophysical Research: Space Physics, 2013, 118, 744-755.	2.4	80
14	MMS Observation of Magnetic Reconnection in the Turbulent Magnetosheath. Journal of Geophysical Research: Space Physics, 2017, 122, 11,442.	2.4	73
15	Investigating Mercuryâ€™s Environment with the Two-Spacecraft BepiColombo Mission. Space Science Reviews, 2020, 216, 1.	8.1	71
16	On the generation of magnetosheath highâ€'speed jets by bow shock ripples. Journal of Geophysical Research: Space Physics, 2013, 118, 7237-7245.	2.4	68
17	Electron jet of asymmetric reconnection. Geophysical Research Letters, 2016, 43, 5571-5580.	4.0	66
18	In Situ Observations of a Magnetosheath Highâ€Speed Jet Triggering Magnetopause Reconnection. Geophysical Research Letters, 2018, 45, 1732-1740.	4.0	66

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19	How Accurately Can We Measure the Reconnection Rate <i>E</i>_{<i>M</i>} for the MMS Diffusion Region Event of 11 July 2017?. Journal of Geophysical Research: Space Physics, 2018, 123, 9130-9149.	2.4	64
20	Direct observations of a surface eigenmode of the dayside magnetopause. Nature Communications, 2019, 10, 615.	12.8	63
21	Observations of whistler mode waves with nonlinear parallel electric fields near the dayside magnetic reconnection separatrix by the Magnetospheric Multiscale mission. Geophysical Research Letters, 2016, 43, 5909-5917.	4.0	61
22	Geoeffective jets impacting the magnetopause are very common. Journal of Geophysical Research: Space Physics, 2016, 121, 3240-3253.	2.4	54
23	MMS observations of ionâ€scale magnetic island in the magnetosheath turbulent plasma. Geophysical Research Letters, 2016, 43, 7850-7858.	4.0	53
24	The Electron Drift Instrument for MMS. Space Science Reviews, 2016, 199, 283-305.	8.1	52
25	Surface waves and field line resonances: A THEMIS case study. Journal of Geophysical Research, 2009, 114, .	3.3	51
26	Electron Heating at Kinetic Scales in Magnetosheath Turbulence. Astrophysical Journal, 2017, 836, 247.	4.5	50
27	Multispacecraft analysis of dipolarization fronts and associated whistler wave emissions using MMS data. Geophysical Research Letters, 2016, 43, 7279-7286.	4.0	49
28	The THEMIS Fluxgate Magnetometer. , 2009, , 235-264.		47
29	Standing AlfvÃ©n waves at the magnetopause. Geophysical Research Letters, 2009, 36, .	4.0	45
30	The BepiColombo Planetary Magnetometer MPO-MAG: What Can We Learn from the Hermean Magnetic Field?. Space Science Reviews, 2021, 217, 1.	8.1	45
31	First Results from ARTEMIS, a New Two-Spacecraft Lunar Mission: Counter-Streaming Plasma Populations in the Lunar Wake. Space Science Reviews, 2011, 165, 93-107.	8.1	44
32	First lunar wake passage of ARTEMIS: Discrimination of wake effects and solar wind fluctuations by 3D hybrid simulations. Planetary and Space Science, 2011, 59, 661-671.	1.7	44
33	Whistler mode waves and Hall fields detected by MMS during a dayside magnetopause crossing. Geophysical Research Letters, 2016, 43, 5943-5952.	4.0	44
34	Global observations of magnetospheric highâ€<i>m</i> poloidal waves during the 22 June 2015 magnetic storm. Geophysical Research Letters, 2017, 44, 3456-3464.	4.0	43
35	Impacts of Magnetosheath Highâ€Speed Jets on the Magnetosphere and Ionosphere Measured by Optical Imaging and Satellite Observations. Journal of Geophysical Research: Space Physics, 2018, 123, 4879-4894.	2.4	41
36	The Role of the Parallel Electric Field in Electronâ€Scale Dissipation at Reconnecting Currents in the Magnetosheath. Journal of Geophysical Research: Space Physics, 2018, 123, 6533-6547.	2.4	40

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37	Properties of standing Kruskal-Schwarzschild-modes at the magnetopause. Annales Geophysicae, 2011, 29, 1793-1807.	1.6	39
38	Transient Pc3 wave activity generated by a hot flow anomaly: Cluster, Rosetta, and ground-based observations. Journal of Geophysical Research, 2011, 116, n/a-n/a.	3.3	38
39	A comparative study of dipolarization fronts at MMS and Cluster. Geophysical Research Letters, 2016, 43, 6012-6019.	4.0	37
40	Magnetopause erosion during the 17 March 2015 magnetic storm: Combined fieldâ€aligned currents, auroral oval, and magnetopause observations. Geophysical Research Letters, 2016, 43, 2396-2404.	4.0	36
41	Mirror mode structures near Venus and Comet P/Halley. Annales Geophysicae, 2014, 32, 651-657.	1.6	33
42	Multiscale Currents Observed by MMS in the Flow Braking Region. Journal of Geophysical Research: Space Physics, 2018, 123, 1260-1278.	2.4	32
43	Magnetopause surface oscillation frequencies at different solar wind conditions. Annales Geophysicae, 2009, 27, 4521-4532.	1.6	32
44	Lunar precursor effects in the solar wind and terrestrial magnetosphere. Journal of Geophysical Research, 2012, 117, .	3.3	31
45	Lower Hybrid Drift Waves and Electromagnetic Electron Spaceâ€Phase Holes Associated With Dipolarization Fronts and Fieldâ€Aligned Currents Observed by the Magnetospheric Multiscale Mission During a Substorm. Journal of Geophysical Research: Space Physics, 2017, 122, 12,236.	2.4	31
46	Transient, smallâ€scale fieldâ€aligned currents in the plasma sheet boundary layer during storm time substorms. Geophysical Research Letters, 2016, 43, 4841-4849.	4.0	30
47	Jets in the magnetosheath: IMF control of where they occur. Annales Geophysicae, 2019, 37, 689-697.	1.6	30
48	Two states of magnetotail dipolarization fronts: A statistical study. Journal of Geophysical Research: Space Physics, 2015, 120, 1096-1108.	2.4	29
49	The global structure and time evolution of dayside magnetopause surface eigenmodes. Geophysical Research Letters, 2015, 42, 2594-2602.	4.0	29
50	Mirror mode waves in Venus's magnetosheath: solar minimum vs. solar maximum. Annales Geophysicae, 2016, 34, 1099-1108.	1.6	29
51	Force balance at the magnetopause determined with MMS: Application to flux transfer events. Geophysical Research Letters, 2016, 43, 11,941.	4.0	27
52	Classifying Magnetosheath Jets Using MMS: Statistical Properties. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027754.	2.4	27
53	First remote measurements of lunar surface charging from ARTEMIS: Evidence for nonmonotonic sheath potentials above the dayside surface. Journal of Geophysical Research, 2011, 116, n/a-n/a.	3.3	26
54	Observations of largeâ€amplitude, parallel, electrostatic waves associated with the Kelvinâ€Helmholtz instability by the magnetospheric multiscale mission. Geophysical Research Letters, 2016, 43, 8859-8866.	4.0	26

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55	The Properties of Lion Roars and Electron Dynamics in Mirror Mode Waves Observed by the Magnetospheric MultiScale Mission. Journal of Geophysical Research: Space Physics, 2018, 123, 93-103.	2.4	26
56	Magnetosheath jet properties and evolution as determined by a global hybrid-Vlasov simulation. Annales Geophysicae, 2018, 36, 1171-1182.	1.6	26
57	Electron Bernstein waves driven by electron crescents near the electron diffusion region. Nature Communications, 2020, 11, 141.	12.8	26
58	Do Statistical Models Capture the Dynamics of the Magnetopause During Sudden Magnetospheric Compressions?. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027289.	2.4	26
59	On the magnetic characteristics of magnetic holes in the solar wind between Mercury and Venus. Annales Geophysicae, 2020, 38, 51-60.	1.6	26
60	THEMIS observations of duskside compressional Pc5 waves. Journal of Geophysical Research, 2009, 114, .	3.3	25
61	BepiColombo Science Investigations During Cruise and Flybys at the Earth, Venus and Mercury. Space Science Reviews, 2021, 217, 1.	8.1	25
62	First observations of magnetic holes deep within the coma of a comet. Astronomy and Astrophysics, 2018, 618, A114.	5.1	24
63	Statistical study of the magnetopause motion: First results from THEMIS. Journal of Geophysical Research, 2009, 114, .	3.3	23
64	Magnetopause surface waves: THEMIS observations compared to MHD theory. Journal of Geophysical Research: Space Physics, 2013, 118, 1483-1499.	2.4	23
65	Magnetosheath Highâ€Speed Jets: Internal Structure and Interaction With Ambient Plasma. Journal of Geophysical Research: Space Physics, 2017, 122, 10,157.	2.4	23
66	Determining the Mode, Frequency, and Azimuthal Wave Number of ULF Waves During a HSS and Moderate Geomagnetic Storm. Journal of Geophysical Research: Space Physics, 2018, 123, 6457-6477.	2.4	23
67	New Insights into the Nature of Turbulence in the Earth's Magnetosheath Using Magnetospheric MultiScale Mission Data. Astrophysical Journal, 2018, 859, 127.	4.5	23
68	Scale Sizes of Magnetosheath Jets. Journal of Geophysical Research: Space Physics, 2020, 125, e2020JA027962.	2.4	23
69	Magnetospheric quasi-static response to the dynamic magnetosheath: A THEMIS case study. Geophysical Research Letters, 2008, 35, .	4.0	22
70	Optimized merging of search coil and fluxgate data for MMS. Geoscientific Instrumentation, Methods and Data Systems, 2016, 5, 521-530.	1.6	22
71	The nonlinear behavior of whistler waves at the reconnecting dayside magnetopause as observed by the Magnetospheric Multiscale mission: A case study. Journal of Geophysical Research: Space Physics, 2017, 122, 5487-5501.	2.4	22
72	Electron Acceleration and Thermalization at Magnetotail Separatrices. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027440.	2.4	21

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73	Statistical analysis of ground based magnetic field measurements with the field line resonance detector. Annales Geophysicae, 2008, 26, 3477-3489.	1.6	20
74	A Statistical Study on the Properties of Dips Ahead of Dipolarization Fronts Observed by MMS. Journal of Geophysical Research: Space Physics, 2019, 124, 139-150.	2.4	20
75	The BepiColomboâ€“Mio Magnetometer en Route to Mercury. Space Science Reviews, 2020, 216, 1.	8.1	19
76	Magnetic Holes in the Solar Wind and Magnetosheath Near Mercury. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028961.	2.4	18
77	Interinstrument calibration using magnetic field data from the flux-gate magnetometer (FGM) and electron drift instrument (EDI) onboard Cluster. Geoscientific Instrumentation, Methods and Data Systems, 2014, 3, 1-11.	1.6	17
78	Frequency variability of standing AlfvÃ©n waves excited by fast mode resonances in the outer magnetosphere. Geophysical Research Letters, 2015, 42, 10,150.	4.0	17
79	Fluxgate magnetometer offset vector determination by the 3D mirror mode method. Monthly Notices of the Royal Astronomical Society, 2017, 469, S675-S684.	4.4	17
80	Simultaneous Remote Observations of Intense Reconnection Effects by DMSP and MMS Spacecraft During a Storm Time Substorm. Journal of Geophysical Research: Space Physics, 2017, 122, 10891-10909.	2.4	17
81	Magnetopause ripples going against the flow form azimuthally stationary surface waves. Nature Communications, 2021, 12, 5697.	12.8	17
82	What frequencies of standing surface waves can the subsolar magnetopause support?. Journal of Geophysical Research: Space Physics, 2015, 120, 3632-3646.	2.4	16
83	On determining fluxgate magnetometer spin axis offsets from mirror mode observations. Annales Geophysicae, 2016, 34, 759-766.	1.6	16
84	Ultralow Frequency Waves Deep Inside the Inner Magnetosphere Driven by Dipolarizing Flux Bundles. Journal of Geophysical Research: Space Physics, 2017, 122, 10,112.	2.4	16
85	Statistical study of linear magnetic hole structures near Earth. Annales Geophysicae, 2021, 39, 239-253.	1.6	16
86	Solar Wind Control of Magnetosheath Jet Formation and Propagation to the Magnetopause. Journal of Geophysical Research: Space Physics, 2021, 126, e2021JA029592.	2.4	16
87	Wave telescope technique for MMS magnetometer. Geophysical Research Letters, 2016, 43, 4774-4780.	4.0	15
88	Near-Earth plasma sheet boundary dynamics during substorm dipolarization. Earth, Planets and Space, 2017, 69, 129.	2.5	15
89	Investigating the anatomy of magnetosheath jets â€“ MMS observations. Annales Geophysicae, 2018, 36, 655-677.	1.6	15
90	On the deviation from Maxwellian of the ion velocity distribution functions in the turbulentÂmagnetosheath. Journal of Plasma Physics, 2020, 86, .	2.1	15

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91	The Magnetospheric Multiscale Magnetometers. , 2017, , 189-256.		15
92	Downstream high-speed plasma jet generation as a direct consequence of shock reformation. Nature Communications, 2022, 13, 598.	12.8	15
93	Flux-gate magnetometer spin axis offset calibration using the electron drift instrument. Measurement Science and Technology, 2014, 25, 105008.	2.6	14
94	Steepening of waves at the duskside magnetopause. Geophysical Research Letters, 2016, 43, 7373-7380.	4.0	14
95	Enhanced Escape of Spacecraft Photoelectrons Caused by Langmuir and Upper Hybrid Waves. Journal of Geophysical Research: Space Physics, 2018, 123, 7534-7553.	2.4	14
96	Particle energization in space plasmas: towards a multi-point, multi-scale plasma observatory. Experimental Astronomy, 2022, 54, 427-471.	3.7	14
97	A new method for solving the MHD equations in the magnetosheath. Annales Geophysicae, 2013, 31, 419-437.	1.6	13
98	Space Weather Magnetometer Aboard GEO-KOMPSAT-2A. Space Science Reviews, 2020, 216, 1.	8.1	13
99	Upperâ€Hybrid Waves Driven by Meandering Electrons Around Magnetic Reconnection X Line. Geophysical Research Letters, 2021, 48, e2021GL093164.	4.0	13
100	Magnetosheath Jet Occurrence Rate in Relation to CMEs and SIRs. Journal of Geophysical Research: Space Physics, 2022, 127, .	2.4	13
101	Multi-scale observations of the magnetopause Kelvinâ€“Helmholtz waves during southward IMF. Physics of Plasmas, 2022, 29, .	1.9	12
102	A Case for Electron-Astrophysics. Experimental Astronomy, 0, , 1.	3.7	11
103	Statistical Study of Magnetosheath Jetâ€Driven Bow Waves. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027710.	2.4	11
104	How many solar wind data are sufficient for accurate fluxgate magnetometer offset determinations?. Geoscientific Instrumentation, Methods and Data Systems, 2019, 8, 285-291.	1.6	11
105	Electrodynamic context of magnetopause dynamics observed by magnetospheric multiscale. Geophysical Research Letters, 2016, 43, 5988-5996.	4.0	10
106	Structure, force balance, and topology of Earthâ€™s magnetopause. Science, 2017, 356, 960-963.	12.6	10
107	On Multiple Hallâ€Like Electron Currents and Tripolar Guide Magnetic Field Perturbations During Kelvinâ€Helmholtz Waves. Journal of Geophysical Research: Space Physics, 2018, 123, 1305-1324.	2.4	10
108	Dipolarization Fronts: Tangential Discontinuities? On the Spatial Range of Validity of the MHD Jump Conditions. Journal of Geophysical Research: Space Physics, 2019, 124, 9963-9975.	2.4	10

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109	Decay of Kelvinâ€Helmholtz Vortices at the Earth's Magnetopause Under Pure Southward IMF Conditions. Geophysical Research Letters, 2020, 47, e2020GL087574.	4.0	10
110	Maximum-variance gradiometer technique for removal of spacecraft-generated disturbances from magnetic field data. Geoscientific Instrumentation, Methods and Data Systems, 2020, 9, 451-469.	1.6	10
111	Alternative interpretation of results from Kelvinâ€Helmholtz vortex identification criteria. Geophysical Research Letters, 2014, 41, 244-250.	4.0	9
112	Plasma flow patterns in and around magnetosheath jets. Annales Geophysicae, 2018, 36, 695-703.	1.6	9
113	Fieldâ€Aligned Currents Originating From the Magnetic Reconnection Region: Conjugate MMSâ€ARTEMIS Observations. Geophysical Research Letters, 2018, 45, 5836-5844.	4.0	9
114	Advanced calibration of magnetometers on spin-stabilized spacecraft based on parameter decoupling. Geoscientific Instrumentation, Methods and Data Systems, 2019, 8, 63-76.	1.6	9
115	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
116	Pickâ€Up Ion Cyclotron Waves Around Mercury. Geophysical Research Letters, 2021, 48, e2021GL092606.	4.0	8
117	Multi-scale evolution of Kelvinâ€"Helmholtz waves at the Earth's magnetopause during southward IMF periods. Physics of Plasmas, 2022, 29, .	1.9	8
118	Periodic black auroral patches at the dawnside dipolarization front during a substorm. Journal of Geophysical Research, 2011, 116, .	3.3	7
119	On the alignment of velocity and magnetic fields within magnetosheath jets. Annales Geophysicae, 2020, 38, 287-296.	1.6	7
120	Magnetometer in-flight offset accuracy for the BepiColombo spacecraft. Annales Geophysicae, 2020, 38, 823-832.	1.6	7
121	Modelling of spacecraft spin period during eclipse. Annales Geophysicae, 2011, 29, 875-882.	1.6	6
122	Occurrence rate of dipolarization fronts in the plasma sheet: Cluster observations. Annales Geophysicae, 2017, 35, 1015-1022.	1.6	6
123	Singing Comet Waves in a Solar Wind Convective Electric Field Frame. Geophysical Research Letters, 2020, 47, e2020GL087418.	4.0	5
124	MMS Observations of Reconnection Separatrix Region in the Magnetotail at Different Distances From the Active Neutral Xâ€Line. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028694.	2.4	5
125	Investigation of the homogeneity of energy conversion processes at dipolarization fronts from MMS measurements. Physics of Plasmas, 2022, 29, .	1.9	5
126	Magnetosheath plasma flow model around Mercury. Annales Geophysicae, 2021, 39, 563-570.	1.6	4

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127	First Results from ARTEMIS, a New Two-Spacecraft Lunar Mission: Counter-Streaming Plasma Populations in the Lunar Wake. , 2011, , 93-107.		4
128	Spin axis offset calibration on THEMIS using mirror modes. Annales Geophysicae, 2017, 35, 117-121.	1.6	4
129	Error estimate for fluxgate magnetometer in-flight calibration on a spinning spacecraft. Geoscientific Instrumentation, Methods and Data Systems, 2021, 10, 13-24.	1.6	3
130	Exploring solar-terrestrial interactions via multiple imaging observers. Experimental Astronomy, 0, , 1.	3.7	3
131	Cometary plasma science. Experimental Astronomy, 2022, 54, 1129-1167.	3.7	3
132	Venus's induced magnetosphere during active solar wind conditions at BepiColombo's Venus 1 flyby. Annales Geophysicae, 2021, 39, 811-831.	1.6	3
133	The FIELDS Instrument Suite on MMS: Scientific Objectives, Measurements, and Data Products. , 2017, , 105-135.		3
134	Statistical investigation of electric field fluctuations around the lower-hybrid frequency range at dipolarization fronts in the near-earth magnetotail. Physics of Plasmas, 2022, 29, .	1.9	3
135	Millisecond observations of nonlinear waveâ€“electron interaction in electron phase space holes. Physics of Plasmas, 2022, 29, .	1.9	3
136	MMS Observations of Field Line Resonances Under Disturbed Solar Wind Conditions. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028936.	2.4	2
137	Magnetic Field in Magnetosheath Jets: A Statistical Study of <i>B</i>_{<i>Z</i>} Near the Magnetopause. Journal of Geophysical Research: Space Physics, 2021, 126, e2021JA029188.	2.4	2
138	The Magnetospheric Multiscale Magnetometers. , 2016, 199, 189.		1
139	The Electron Drift Instrument for MMS. , 2017, , 283-305.		0