

# Cynthia J O Reichhardt

## List of Publications by Year in descending order

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195  
papers

7,379  
citations

50276

46  
h-index

69250

77  
g-index

201  
all docs

201  
docs citations

201  
times ranked

2806  
citing authors

#	ARTICLE	IF	CITATIONS
1	Active regimes for particles on resource landscapes. <i>Physical Review Research</i> , 2022, 4, .	3.6	3
2	Phonon spectra of a two-dimensional solid dusty plasma modified by two-dimensional periodic substrates. <i>Physical Review E</i> , 2022, 105, 015202.	2.1	7
3	Directed motion of liquid crystal skyrmions with oscillating fields. <i>New Journal of Physics</i> , 2022, 24, 033033.	2.9	2
4	Reversible to irreversible transitions for cyclically driven particles on periodic obstacle arrays. <i>Journal of Chemical Physics</i> , 2022, 156, 124901.	3.0	3
5	Active rheology and anticommutation effects for driven probe particles on two-dimensional periodic pinning substrates. <i>Physical Review Research</i> , 2022, 4, .	3.6	2
6	Crystals break up with a twist. <i>Nature Physics</i> , 2022, 18, 134-135.	16.7	1
7	Commensuration effects on skyrmion Hall angle and drag for manipulation of skyrmions on two-dimensional periodic substrates. <i>Physical Review B</i> , 2022, 105, .	3.2	5
8	Driven superconducting vortex dynamics in systems with twofold anisotropy in the presence of pinning. <i>New Journal of Physics</i> , 2022, 24, 073029.	2.9	2
9	Directional locking in a two-dimensional Yukawa solid modulated by a two-dimensional periodic substrate. <i>Physical Review E</i> , 2022, 106, .	2.1	7
10	Kibble-Zurek mechanism for nonequilibrium phase transitions in driven systems with quenched disorder. <i>Communications Physics</i> , 2022, 5, .	5.3	5
11	Directional clogging and phase separation for disk flow through periodic and diluted obstacle arrays. <i>Soft Matter</i> , 2021, 17, 1548-1557.	2.7	6
12	Active matter commensuration and frustration effects on periodic substrates. <i>Physical Review E</i> , 2021, 103, 022602.	2.1	15
13	Drive dependence of the Hall angle for a sliding Wigner crystal in a magnetic field. <i>Physical Review B</i> , 2021, 103, .	3.2	7
14	Structure and dynamical properties of two-dimensional dusty plasmas on one-dimensional periodic substrates. <i>Physics of Plasmas</i> , 2021, 28, .	1.9	7
15	Clogging, dynamics, and reentrant fluid for active matter on periodic substrates. <i>Physical Review E</i> , 2021, 103, 062603.	2.1	8
16	Guided skyrmion motion along pinning array interfaces. <i>Journal of Magnetism and Magnetic Materials</i> , 2021, 528, 167710.	2.3	17
17	Directional locking and the influence of obstacle density on skyrmion dynamics in triangular and honeycomb arrays. <i>Journal of Physics Condensed Matter</i> , 2021, 33, 305801.	1.8	4
18	Vortex dynamics, pinning, and angle-dependent motion on moiré patterns. <i>Physical Review B</i> , 2021, 104, .	3.2	5

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19	Skyrmion ratchet in funnel geometries. <i>Physical Review B</i> , 2021, 104, .	3.2	20
20	Dynamics and nonmonotonic drag for individually driven skyrmions. <i>Physical Review B</i> , 2021, 104, .	3.2	5
21	Active matter shepherding and clustering in inhomogeneous environments. <i>Physical Review E</i> , 2021, 104, 044613.	2.1	7
22	Rotational transition, domain formation, dislocations, and defects in vortex systems with combined sixfold and twelfold anisotropic interactions. <i>Physical Review B</i> , 2020, 101, .	3.2	5
23	Directional locking effects for active matter particles coupled to a periodic substrate. <i>Physical Review E</i> , 2020, 102, 042616.	2.1	19
24	Jamming, fragility and pinning phenomena in superconducting vortex systems. <i>Scientific Reports</i> , 2020, 10, 11625.	3.3	3
25	Shapiro steps and nonlinear skyrmion Hall angles for dc and ac driven skyrmions on a two-dimensional periodic substrate. <i>Physical Review B</i> , 2020, 102, .	3.2	10
26	Continuous and discontinuous transitions in the depinning of two-dimensional dusty plasmas on a one-dimensional periodic substrate. <i>Physical Review E</i> , 2020, 102, 063203.	2.1	11
27	Collective effects and pattern formation for directional locking of disks moving through obstacle arrays. <i>Physical Review E</i> , 2020, 102, 022608.	2.1	4
28	Colloidal Dynamics on a Choreographic Time Crystal. <i>Physical Review Letters</i> , 2020, 124, 208004.	7.8	9
29	Dynamics of Magnus-dominated particle clusters, collisions, pinning, and ratchets. <i>Physical Review E</i> , 2020, 101, 062602.	2.1	13
30	Shear banding, intermittency, jamming, and dynamic phases for skyrmions in inhomogeneous pinning arrays. <i>Physical Review B</i> , 2020, 101, .	3.2	14
31	Skyrmion dynamics and topological sorting on periodic obstacle arrays. <i>New Journal of Physics</i> , 2020, 22, 053025.	2.9	16
32	Commensurate states and pattern switching via liquid crystal skyrmions trapped in a square lattice. <i>Soft Matter</i> , 2020, 16, 3338-3343.	2.7	21
33	Detecting depinning and nonequilibrium transitions with unsupervised machine learning. <i>Physical Review E</i> , 2020, 101, 042101.	2.1	3
34	Oscillation-like diffusion of two-dimensional liquid dusty plasmas on one-dimensional periodic substrates with varied widths. <i>Physics of Plasmas</i> , 2020, 27, 033702.	1.9	9
35	Vortex guidance and transport in channeled pinning arrays. <i>Low Temperature Physics</i> , 2020, 46, 309-315.	0.6	1
36	Skyrmion dynamics and transverse mobility: skyrmion Hall angle reversal on 2D periodic substrates with dc and biharmonic ac drives. <i>European Physical Journal B</i> , 2020, 93, 1.	1.5	8

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37	Plastic flow and the skyrmion Hall effect. <i>Nature Communications</i> , 2020, 11, 738.	12.8	12
38	Braiding Majorana fermions and creating quantum logic gates with vortices on a periodic pinning structure. <i>Physical Review B</i> , 2020, 101, .	3.2	27
39	Skyrmion pinball and directed motion on obstacle arrays. <i>Journal of Physics Communications</i> , 2020, 4, 085001.	1.2	8
40	Quenched dynamics of artificial colloidal spin ice. <i>Physical Review Research</i> , 2020, 2, .	3.6	8
41	Reversible to irreversible transitions in periodically driven skyrmion systems. <i>New Journal of Physics</i> , 2019, 21, 013001.	2.9	17
42	Active microrheology, Hall effect, and jamming in chiral fluids. <i>Physical Review E</i> , 2019, 100, 012604.	2.1	24
43	Depinning dynamics of two-dimensional dusty plasmas on a one-dimensional periodic substrate. <i>Physical Review E</i> , 2019, 100, 033207.	2.1	18
44	Skyrmions in anisotropic magnetic fields: strain and defect driven dynamics. <i>MRS Advances</i> , 2019, 4, 643-650.	0.9	3
45	Reversibility, pattern formation, and edge transport in active chiral and passive disk mixtures. <i>Journal of Chemical Physics</i> , 2019, 150, 064905.	3.0	22
46	Nonlinear transport, dynamic ordering, and clustering for driven skyrmions on random pinning. <i>Physical Review B</i> , 2019, 99, .	3.2	18
47	Dynamic phases, stratification, laning, and pattern formation for driven bidisperse disk systems in the presence of quenched disorder. <i>Physical Review E</i> , 2019, 99, 042601.	2.1	2
48	Noise spectra in the reversibleâ€“irreversible transition in amorphous solids under oscillatory driving. <i>Modelling and Simulation in Materials Science and Engineering</i> , 2019, 27, 084004.	2.0	4
49	Chiral edge currents for ac-driven skyrmions in confined pinning geometries. <i>Physical Review B</i> , 2019, 100, .	3.2	5
50	Vortex shear banding transitions in superconductors with inhomogeneous pinning arrays. <i>Journal of Physics Communications</i> , 2019, 3, 125009.	1.2	1
51	Disordering, clustering, and laning transitions in particle systems with dispersion in the Magnus term. <i>Physical Review E</i> , 2019, 99, 012606.	2.1	7
52	Thermal creep and the skyrmion Hall angle in driven skyrmion crystals. <i>Journal of Physics Condensed Matter</i> , 2019, 31, 07LT01.	1.8	36
53	Negative differential mobility and trapping in active matter systems. <i>Journal of Physics Condensed Matter</i> , 2018, 30, 015404.	1.8	25
54	Inner Phases of Colloidal Hexagonal Spin Ice. <i>Physical Review Letters</i> , 2018, 120, 027204.	7.8	22

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55	Avalanches and Criticality in Driven Magnetic Skyrmions. <i>Physical Review Letters</i> , 2018, 120, 117203.	7.8	22
56	Velocity force curves, laning, and jamming for oppositely driven disk systems. <i>Soft Matter</i> , 2018, 14, 490-498.	2.7	23
57	Phonon spectra of two-dimensional liquid dusty plasmas on a one-dimensional periodic substrate. <i>Physical Review E</i> , 2018, 98, .	2.1	19
58	Structures and diffusion of two-dimensional dusty plasmas on one-dimensional periodic substrates. <i>Physical Review E</i> , 2018, 98, .	2.1	16
59	Nonequilibrium phases and segregation for skyrmions on periodic pinning arrays. <i>Physical Review B</i> , 2018, 98, .	3.2	32
60	Ice rule fragility via topological charge transfer in artificial colloidal ice. <i>Nature Communications</i> , 2018, 9, 4146.	12.8	25
61	Clogging and depinning of ballistic active matter systems in disordered media. <i>Physical Review E</i> , 2018, 97, 052613.	2.1	35
62	Avalanche dynamics for active matter in heterogeneous media. <i>New Journal of Physics</i> , 2018, 20, 025002.	2.9	34
63	Manipulation of individual superconducting vortices and stick-slip motion in periodic pinning arrays. <i>Physical Review B</i> , 2018, 97, .	3.2	12
64	Controlled Fluidization, Mobility, and Clogging in Obstacle Arrays Using Periodic Perturbations. <i>Physical Review Letters</i> , 2018, 121, 068001.	7.8	13
65	Crossover from Jamming to Clogging Behaviours in Heterogeneous Environments. <i>Scientific Reports</i> , 2018, 8, 10252.	3.3	33
66	Clogging and transport of driven particles in asymmetric funnel arrays. <i>Journal of Physics Condensed Matter</i> , 2018, 30, 244005.	1.8	5
67	Structural transitions in vortex systems with anisotropic interactions. <i>New Journal of Physics</i> , 2018, 20, 023005.	2.9	12
68	Laning and clustering transitions in driven binary active matter systems. <i>Physical Review E</i> , 2018, 98, 022603.	2.1	25
69	Reversible vector ratchets for skyrmion systems. <i>Physical Review B</i> , 2017, 95, .	3.2	32
70	Dewetting and spreading transitions for active matter on random pinning substrates. <i>Journal of Chemical Physics</i> , 2017, 146, 204903.	3.0	17
71	Dynamic phases of active matter systems with quenched disorder. <i>Physical Review E</i> , 2017, 95, 032606.	2.1	61
72	Ratchet Effects in Active Matter Systems. <i>Annual Review of Condensed Matter Physics</i> , 2017, 8, 51-75.	14.5	174

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73	Depinning and nonequilibrium dynamic phases of particle assemblies driven over random and ordered substrates: a review. Reports on Progress in Physics, 2017, 80, 026501.	20.1	197
74	Enhanced pinning for vortices in hyperuniform pinning arrays and emergent hyperuniform vortex configurations with quenched disorder. Physical Review B, 2017, 96, .	3.2	30
75	Collective transport for active matter run-and-tumble disk systems on a traveling-wave substrate. Physical Review E, 2017, 95, 012607.	2.1	23
76	Dynamic Control of Topological Defects in Artificial Colloidal Ice. Scientific Reports, 2017, 7, 651.	3.3	12
77	Shapiro spikes and negative mobility for skyrmion motion on quasi-one-dimensional periodic substrates. Physical Review B, 2017, 95, .	3.2	12
78	Fluctuations and noise signatures of driven magnetic skyrmions. Physical Review B, 2017, 96, .	3.2	46
79	Clogging and jamming transitions in periodic obstacle arrays. Physical Review E, 2017, 95, 030902.	2.1	28
80	Dynamic phases, clustering, and chain formation for driven disk systems in the presence of quenched disorder. Physical Review E, 2017, 95, 042902.	2.1	12
81	Noise fluctuations and drive dependence of the skyrmion Hall effect in disordered systems. New Journal of Physics, 2016, 18, 095005.	2.9	98
82	Emergent geometric frustration of artificial magnetic skyrmion crystals. Physical Review B, 2016, 94, .	3.2	29
83	Magnus-induced dynamics of driven skyrmions on a quasi-one-dimensional periodic substrate. Physical Review B, 2016, 94, .	3.2	28
84	Oriental ordering, buckling, and dynamic transitions for vortices interacting with a periodic quasi-one-dimensional substrate. Physical Review B, 2016, 93, .	3.2	15
85	Avalanches, plasticity, and ordering in colloidal crystals under compression. Physical Review E, 2016, 93, 062607.	2.1	10
86	Reversible ratchet effects for vortices in conformal pinning arrays. Physical Review B, 2015, 91, .	3.2	36
87	Shapiro steps for skyrmion motion on a washboard potential with longitudinal and transverse ac drives. Physical Review B, 2015, 92, .	3.2	36
88	Active microrheology in active matter systems: Mobility, intermittency, and avalanches. Physical Review E, 2015, 91, 032313.	2.1	43
89	Collective Transport Properties of Driven Skyrmions with Random Disorder. Physical Review Letters, 2015, 114, 217202.	7.8	181
90	Quantized transport for a skyrmion moving on a two-dimensional periodic substrate. Physical Review B, 2015, 91, .	3.2	81

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91	Magnus-induced ratchet effects for skyrmions interacting with asymmetric substrates. <i>New Journal of Physics</i> , 2015, 17, 073034.	2.9	59
92	Casimir effect in active matter systems. <i>Physical Review E</i> , 2014, 90, 013019.	2.1	98
93	Pinning, ordering, and dynamics of vortices in conformal crystal and gradient pinning arrays. <i>Physical Review B</i> , 2014, 90, .	3.2	24
94	Ordering of colloids with competing interactions on quasi-one-dimensional periodic substrates. , 2014, , .		0
95	Vortex transport and pinning in conformal pinning arrays. <i>Physica C: Superconductivity and Its Applications</i> , 2014, 503, 123-127.	1.2	6
96	Aspects of jamming in two-dimensional athermal frictionless systems. <i>Soft Matter</i> , 2014, 10, 2932.	2.7	51
97	Active matter transport and jamming on disordered landscapes. <i>Physical Review E</i> , 2014, 90, 012701.	2.1	105
98	Comparing the dynamics of skyrmions and superconducting vortices. <i>Physica C: Superconductivity and Its Applications</i> , 2014, 503, 52-57.	1.2	9
99	Random organization in periodically driven gliding dislocations. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 2014, 378, 1675-1678.	2.1	12
100	Dynamics and separation of circularly moving particles in asymmetrically patterned arrays. <i>Physical Review E</i> , 2013, 88, 042306.	2.1	48
101	Dynamic regimes for driven colloidal particles on a periodic substrate at commensurate and incommensurate fillings. <i>Physical Review E</i> , 2013, 88, 062301.	2.1	32
102	Vortex Clogging, Commensuration, and Diodes in Asymmetric Constriction Arrays. <i>Journal of Superconductivity and Novel Magnetism</i> , 2013, 26, 2005-2008.	1.8	5
103	Rheology and shear band suppression in particle and chain mixtures. <i>Physical Review E</i> , 2013, 87, 020201.	2.1	3
104	Strongly Enhanced Pinning of Magnetic Vortices in Type-II Superconductors by Conformal Crystal Arrays. <i>Physical Review Letters</i> , 2013, 110, 267001.	7.8	69
105	Static and dynamic phases for magnetic vortex matter with attractive and repulsive interactions. <i>Journal of Physics Condensed Matter</i> , 2013, 25, 345703.	1.8	13
106	Frustrated colloidal ordering and fully packed loops in arrays of optical traps. <i>Physical Review E</i> , 2013, 87, 062305.	2.1	11
107	Active matter ratchets with an external drift. <i>Physical Review E</i> , 2013, 88, 062310.	2.1	39
108	Structural transitions and dynamical regimes for directional locking of vortices and colloids driven over periodic substrates. <i>Journal of Physics Condensed Matter</i> , 2012, 24, 225702.	1.8	23

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109	Jamming in systems with quenched disorder. <i>Physical Review E</i> , 2012, 86, 061301.	2.1	28
110	Hysteresis and return-point memory in colloidal artificial spin ice systems. <i>Physical Review E</i> , 2012, 86, 021406.	2.1	36
111	Statics and dynamics of Yukawa cluster crystals on ordered substrates. <i>Physical Review E</i> , 2012, 85, 051401.	2.1	23
112	Vortex dynamics and symmetry locking on quasiperiodic and periodic substrates. <i>Physica C: Superconductivity and Its Applications</i> , 2012, 479, 45-48.	1.2	5
113	Jamming in granular polymers. <i>Physical Review E</i> , 2011, 84, 011303.	2.1	33
114	Characterizing plastic depinning dynamics with the fluctuation theorem. <i>European Physical Journal E</i> , 2011, 34, 117.	1.6	9
115	Dynamically induced locking and unlocking transitions in driven layered systems with quenched disorder. <i>Physical Review B</i> , 2011, 84, .	3.2	7
116	Dynamical Ordering and Directional Locking for Particles Moving over Quasicrystalline Substrates. <i>Physical Review Letters</i> , 2011, 106, 060603.	7.8	59
117	Anisotropic sliding dynamics, peak effect, and metastability in stripe systems. <i>Physical Review E</i> , 2011, 83, 041501.	2.1	22
118	Dynamical freezing of active matter. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2011, 108, 19099-19100.	7.1	16
119	Driving an individual vortex in the presence of a periodic pinning array. <i>Physica C: Superconductivity and Its Applications</i> , 2010, 470, 779-781.	1.2	5
120	Commensurability, jamming, and dynamics for vortices in funnel geometries. <i>Physical Review B</i> , 2010, 81, .	3.2	28
121	Switching and jamming transistor effect for vortex matter in honeycomb pinning arrays with ac drives. <i>Physical Review B</i> , 2010, 81, .	3.2	10
122	Shear banding and spatiotemporal oscillations in vortex matter in nanostructured superconductors. <i>Physical Review B</i> , 2010, 81, .	3.2	4
123	Structural transitions, melting, and intermediate phases for stripe- and clump-forming systems. <i>Physical Review E</i> , 2010, 82, 041502.	2.1	50
124	Fluctuations, jamming, and yielding for a driven probe particle in disordered disk assemblies. <i>Physical Review E</i> , 2010, 82, 051306.	2.1	38
125	Creating Artificial Ice States Using Vortices in Nanostructured Superconductors. <i>Physical Review Letters</i> , 2009, 102, 237004.	7.8	90
126	Nonequilibrium phases for driven particle systems with effective orientational degrees of freedom. <i>Physical Review E</i> , 2009, 79, 061403.	2.1	17



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127	Pattern switching and polarizability for colloids in optical-trap arrays. <i>Physical Review E</i> , 2009, 80, 022401.	2.1	12
128	Random Organization and Plastic Depinning. <i>Physical Review Letters</i> , 2009, 103, 168301.	7.8	63
129	Coherent and incoherent vortex flow states in crossed channels. <i>Europhysics Letters</i> , 2009, 88, 47004.	2.0	2
130	A Ball-and-Chain Polymer Model. <i>Science</i> , 2009, 326, 374-375.	12.6	12
131	Transport anisotropy as a probe of the interstitial vortex state in superconductors with artificial pinning arrays. <i>Physical Review B</i> , 2009, 79, .	3.2	33
132	Transverse commensurability effect for vortices in periodic pinning arrays. <i>Physical Review B</i> , 2008, 78, .	3.2	9
133	Rectification of Swimming Bacteria and Self-Driven Particle Systems by Arrays of Asymmetric Barriers. <i>Physical Review Letters</i> , 2008, 101, 018102.	7.8	190
134	Reversible to Irreversible Flow Transition in Periodically Driven Vortices. <i>Physical Review Letters</i> , 2008, 100, 187002.	7.8	76
135	Spontaneous Transverse Response and Amplified Switching in Superconductors with Honeycomb Pinning Arrays. <i>Physical Review Letters</i> , 2008, 100, 167002.	7.8	21
136	Moving vortex phases, dynamical symmetry breaking, and jamming for vortices in honeycomb pinning arrays. <i>Physical Review B</i> , 2008, 78, .	3.2	37
137	Viscous decoupling transitions for individually dragged particles in systems with quenched disorder. <i>Physical Review E</i> , 2008, 78, 011402.	2.1	17
138	Vortex molecular crystal and vortex plastic crystal states in honeycomb and kagomÃ© pinning arrays. <i>Physical Review B</i> , 2007, 76, .	3.2	41
139	Point-defect dynamics in two-dimensional colloidal crystals. <i>Physical Review E</i> , 2007, 75, 011403.	2.1	47
140	Origin of Reversed Vortex Ratchet Motion. <i>Physical Review Letters</i> , 2007, 99, 247002.	7.8	52
141	Commensurability effects at nonmatching fields for vortices in diluted periodic pinning arrays. <i>Physical Review B</i> , 2007, 76, .	3.2	33
142	Reversible vortex ratchet effects and ordering in superconductors with simple asymmetric potential arrays. <i>Physical Review B</i> , 2007, 75, .	3.2	80
143	Devilâ€™s staircase and disordering transitions in sliding vortices and Wigner crystals on random substrates with transverse driving. <i>Physical Review B</i> , 2007, 76, .	3.2	10
144	Probing vortex systems with individual vortex manipulation. <i>Physica C: Superconductivity and Its Applications</i> , 2007, 460-462, 1284-1285.	1.2	0

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145	Structure and fragmentation in colloidal artificial molecules and nuclei. European Physical Journal E, 2007, 22, 11-15.	1.6	6
146	Cooperative behavior and pattern formation in mixtures of driven and nondriven colloidal assemblies. Physical Review E, 2006, 74, 011403.	2.1	32
147	Realizing Colloidal Artificial Ice on Arrays of Optical Traps. Physical Review Letters, 2006, 97, 228302.	7.8	102
148	Vortex configurations and dynamics in elliptical pinning sites for high matching fields. Physical Review B, 2006, 73, .	3.2	21
149	Dynamics, Rectification, and Fractionation for Colloids on Flashing Substrates. Physical Review Letters, 2006, 96, 188301.	7.8	45
150	Ratchet effect and nonlinear transport for particles on random substrates with crossed ac drives. Physical Review E, 2006, 73, 011102.	2.1	9
151	Crossover from Intermittent to Continuum Dynamics for Locally Driven Colloids. Physical Review Letters, 2006, 96, 028301.	7.8	19
152	Rectification and flux reversals for vortices interacting with triangular traps. Physica C: Superconductivity and Its Applications, 2005, 432, 125-132.	1.2	31
153	Pinning and dynamics of colloids on one-dimensional periodic potentials. Physical Review E, 2005, 72, 032401.	2.1	26
154	Ordering and melting in colloidal molecular crystal mixtures. Physical Review E, 2005, 71, 062403.	2.1	21
155	Multiscaling at PointJ: Jamming is a Critical Phenomenon. Physical Review Letters, 2005, 95, 088001.	7.8	100
156	Dynamic regimes and spontaneous symmetry breaking for driven colloids on triangular substrates. Europhysics Letters, 2004, 68, 303-309.	2.0	23
157	Nonlinear dynamics, rectification, and phase locking for particles on symmetrical two-dimensional periodic substrates with dc and circular ac drives. Physical Review E, 2004, 69, 056115.	2.1	16
158	Local Melting and Drag for a Particle Driven through a Colloidal Crystal. Physical Review Letters, 2004, 92, 108301.	7.8	49
159	Noise at the Crossover from Wigner Liquid to Wigner Glass. Physical Review Letters, 2004, 93, 176405.	7.8	26
160	Directional locking effects and dynamics for particles driven through a colloidal lattice. Physical Review E, 2004, 69, 041405.	2.1	39
161	Ratchet superconducting vortex cellular automata. Physica C: Superconductivity and Its Applications, 2004, 404, 266-272.	1.2	6
162	Dynamics and melting of stripes, crystals, and bubbles with quenched disorder. Physica D: Nonlinear Phenomena, 2004, 193, 303-309.	2.8	18

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163	Fluctuating Topological Defects in 2D Liquids: Heterogeneous Motion and Noise. Physical Review Letters, 2003, 90, 095504.	7.8	55
164	Disordering transitions in vortex matter: peak effect and phase diagram. Physica C: Superconductivity and Its Applications, 2003, 384, 143-148.	1.2	15
165	Depinning by Fracture in a Glassy Background. Physical Review Letters, 2003, 90, 098302.	7.8	52
166	Metastability and transient effects in vortex matter near a decoupling transition. Physical Review B, 2003, 67, .	3.2	26
167	Charge Transport Transitions and Scaling in Disordered Arrays of Metallic Dots. Physical Review Letters, 2003, 90, 046802.	7.8	48
168	Dynamical Ordering of Driven Stripe Phases in Quenched Disorder. Physical Review Letters, 2003, 90, 026401.	7.8	72
169	Ratchet Cellular Automata. Physical Review Letters, 2003, 90, 247004.	7.8	60
170	Absolute transverse mobility and ratchet effect on periodic two-dimensional symmetric substrates. Physical Review E, 2003, 68, 046102.	2.1	30
171	Structure and melting of two-species charged clusters in a parabolic trap. Physical Review E, 2003, 68, 060401.	2.1	37
172	Depinning and dynamics of systems with competing interactions in quenched disorder. Europhysics Letters, 2003, 61, 221-227.	2.0	37
173	Colloidal Dynamics on Disordered Substrates. Physical Review Letters, 2002, 89, 078301.	7.8	96
174	Vortex pinball under crossed ac drives in superconductors with periodic pinning arrays. Physical Review B, 2002, 65, .	3.2	8
175	Transverse phase locking for vortex motion in square and triangular pinning arrays. Physical Review B, 2002, 65, .	3.2	6
176	Novel Colloidal Crystalline States on Two-Dimensional Periodic Substrates. Physical Review Letters, 2002, 88, 248301.	7.8	102
177	Rectification and Phase Locking for Particles on Symmetric Two-Dimensional Periodic Substrates. Physical Review Letters, 2002, 89, 024101.	7.8	42
178	Individual and multiple vortex pinning in systems with periodic pinning arrays. Physical Review B, 2001, 64, .	3.2	57
179	Commensurate and incommensurate vortex lattice melting in periodic pinning arrays. Physical Review B, 2001, 64, .	3.2	51
180	Complex dynamical flow phases and pinning in superconductors with rectangular pinning arrays. Physical Review B, 2001, 64, .	3.2	85

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181	Collective Interaction-Driven Ratchet for Transporting Flux Quanta. <i>Physical Review Letters</i> , 2001, 87, 177002.	7.8	115
182	Moving Wigner Glasses and Smectics: Dynamics of Disordered Wigner Crystals. <i>Physical Review Letters</i> , 2001, 86, 4354-4357.	7.8	94
183	Transverse depinning in strongly driven vortex lattices with disorder. <i>Physical Review B</i> , 2000, 61, R3811-R3814.	3.2	30
184	Phase Locking, Devil's Staircases, Farey Trees, and Arnold Tongues in Driven Vortex Lattices with Periodic Pinning. <i>Physical Review Letters</i> , 1999, 82, 414-417.	7.8	169
185	Topological Invariants in Microscopic Transport on Rough Landscapes: Morphology, Hierarchical Structure, and Horton Analysis of Riverlike Networks of Vortices. <i>Physical Review Letters</i> , 1999, 82, 3641-3644.	7.8	18
186	Superconducting Fluxon Pumps and Lenses. <i>Physical Review Letters</i> , 1999, 83, 5106-5109.	7.8	222
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