Margaret Cheney

List of Publications by Year
in descending order

48 papers	2,873 citations	448610 19 h-index	325983 40 g-index
49 all docs	49 docs citations	49 times ranked	1600 citing authors

#	Article	IF	Citations
1	Synthetic aperture source localization. Inverse Problems, 2020, 36, 015007.	1.0	3
2	Detection of Backscattered Waves from a Target in Clutter from a Rotating Scatterer. SIAM Journal on Applied Mathematics, 2019, 79, 1916-1939.	0.8	0
3	MIMO-SAR Imaging and Waveform Design. , 2018, , .		0
4	Multipulse Adaptive Coherence for Detection in Wind Turbine Clutter. IEEE Transactions on Aerospace and Electronic Systems, 2017, 53, 3091-3103.	2.6	8
5	Tuning to Resonances With Iterative Time Reversal. IEEE Transactions on Antennas and Propagation, 2016, 64, 4343-4354.	3.1	3
6	Synthetic Aperture Radar Imaging. , 2015, , 763-799.		1
7	Imaging frequency-dependent reflectivity from synthetic-aperture radar. Inverse Problems, 2013, 29, 054002.	1.0	9
8	Waveform Design for Synthetic-Aperture Radar Imaging through Dispersive Media. SIAM Journal on Applied Mathematics, 2011, 71, 1780-1800.	0.8	7
9	Theory of Waveform-Diverse Moving-Target Spotlight Synthetic-Aperture Radar. SIAM Journal on Imaging Sciences, 2011, 4, 1180-1199.	1.3	9
10	Synthetic Aperture Radar Imaging. , 2011, , 655-690.		1
11	Synthetic-aperture radar imaging through dispersive media. Inverse Problems, 2010, 26, 025008.	1.0	7
12	Problems in synthetic-aperture radar imaging. Inverse Problems, 2009, 25, 123005.	1.0	30
13	Imaging moving targets from scattered waves. Inverse Problems, 2008, 24, 035005.	1.0	60
14	Bistatic Synthetic Aperture Hitchhiker Imaging. , 2007, , .		6
15	Synthetic-aperture inversion in the presence of noise and clutter. Inverse Problems, 2006, 22, 1705-1729.	1.0	66
16	Enhanced angular resolution from multiply scattered waves. Inverse Problems, 2006, 22, 1817-1834.	1.0	38
17	Microlocal analysis of GTD-based SAR models. , 2005, 5808, 15.		6
18	Synthetic-aperture imaging from high-Doppler-resolution measurements. Inverse Problems, 2005, 21, 1-11.	1.0	174

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19	Synthetic-aperture imaging through a dispersive layer. Inverse Problems, 2004, 20, 507-532.	1.0	13
20	Imaging that exploits multipath scattering from point scatterers. Inverse Problems, 2004, 20, 1691-1711.	1.0	59
21	Microlocal Analysis of Synthetic Aperture Radar Imaging. Journal of Fourier Analysis and Applications, 2004, 10, 133-148.	0.5	50
22	Synthetic-aperture assessment of a dispersive surface. International Journal of Imaging Systems and Technology, 2004, 14, 28-34.	2.7	12
23	Synthetic aperture inversion for arbitrary flight paths and nonflat topography. IEEE Transactions on Image Processing, 2003, 12, 1035-1043.	6.0	68
24	Synthetic aperture inversion. Inverse Problems, 2002, 18, 221-235.	1.0	101
25	A Mathematical Tutorial on Synthetic Aperture Radar. SIAM Review, 2001, 43, 301-312.	4.2	149
26	Optimal Acoustic Measurements. SIAM Journal on Applied Mathematics, 2001, 61, 1628-1647.	0.8	22
27	Electrical Impedance Tomography. SIAM Review, 1999, 41, 85-101.	4.2	967
28	Uniqueness for a wave propagation inverse problem in a half-space. Inverse Problems, 1998, 14, 679-684.	1.0	21
29	Layer-stripping reconstruction algorithms in impedance imaging. , 1993, , 9-15.		1
30	Problems in impedance imaging. , 1993, , 62-70.		1
31	Existence and Uniqueness for Electrode Models for Electric Current Computed Tomography. SIAM Journal on Applied Mathematics, 1992, 52, 1023-1040.	0.8	740
32	Estimates for wave propagation in inhomogenous acoustic media. Journal of Mathematical Analysis and Applications, 1991, 162, 410-429.	0.5	4
33	A new equation of scattering theory and its use in inverse scattering. Wave Motion, 1989, 11, 175-184.	1.0	9
34	A Fundamental Integral Relation of Scattering Theory. SIAM Journal on Mathematical Analysis, 1988, 19, 1090-1102.	0.9	3
35	Generalization of the Fourier transform: Implications for inverse scattering theory. Physical Review Letters, 1988, 60, 1221-1224.	2.9	11
36	Generalized eigenfunction expansions for scattering in inhomogeneous three€dimensional media. Journal of Mathematical Physics, 1988, 29, 1347-1355.	0.5	4

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37	Self-consistent equations for variable velocity three-dimensional inverse scattering. Physical Review Letters, 1987, 59, 954-957.	2.9	17
38	Three-dimensional inverse scattering. Lecture Notes in Mathematics, 1987, , 46-54.	0.1	3
39	Determination of the Wave Field from Scattering Data. Physical Review Letters, 1986, 57, 783-786.	2.9	18
40	Three‐dimensional inverse scattering: High‐frequency analysis of Newton's Marchenko equation. Journal of Mathematical Physics, 1985, 26, 436-439.	0.5	2
41	Two‐dimensional inverse scattering: Compactness of the generalized Marchenko operator. Journal of Mathematical Physics, 1985, 26, 743-752.	0.5	3
42	Three‐dimensional inverse scattering: Plasma and variable velocity wave equations. Journal of Mathematical Physics, 1985, 26, 2803-2813.	0.5	35
43	Physical basis of three-dimensional inverse scattering for the plasma wave equation. Journal of the Optical Society of America A: Optics and Image Science, and Vision, 1985, 2, 1954.	0.8	6
44	A rigorous derivation of the 'miracle' identity of three‐dimensional inverse scattering. Journal of Mathematical Physics, 1984, 25, 2988-2990.	0.5	14
45	Inverse scattering in dimension two. Journal of Mathematical Physics, 1984, 25, 94-107.	0.5	24
46	Velocity and density of a two‐dimensional acoustic medium from point source surface data. Journal of Mathematical Physics, 1984, 25, 1857-1861.	0.5	23
47	Two‐dimensional scattering: The number of bound states from scattering data. Journal of Mathematical Physics, 1984, 25, 1449-1455.	0.5	25
48	The connection between time‐and frequency‐domain three‐dimensional inverse scattering methods. Journal of Mathematical Physics, 1984, 25, 2995-3000.	0.5	40