Xiaoli

List of Publications by Year
in descending order

54 papers	903 citations	430874 18 h-index	501196 28 g-index
54 all docs	54 docs citations	54 times ranked	301 citing authors

#	ARTICLE	IF	CITATIONS
1	The Exponential Scalar Auxiliary Variable (E-SAV) Approach for Phase Field Models and Its Explicit Computing. SIAM Journal of Scientific Computing, 2020, 42, B630-B655.	2.8	83
2	Energy stability and convergence of SAV block-centered finite difference method for gradient flows. Mathematics of Computation, 2019, 88, 2047-2068.	2.1	76
3	Error Analysis of the SAV-MAC Scheme for the Navier--Stokes Equations. SIAM Journal on Numerical Analysis, 2020, 58, 2465-2491.	2.3	45
4	Efficient modified techniques of invariant energy quadratization approach for gradient flows. Applied Mathematics Letters, 2019, 98, 206-214.	2.7	44
5	Efficient modified stabilized invariant energy quadratization approaches for phase-field crystal equation. Numerical Algorithms, 2020, 85, 107-132.	1.9	40
6	Stability and error estimates of the SAV Fourier-spectral method for the phase field crystal equation. Advances in Computational Mathematics, 2020, 46, 1.	1.6	39
7	A Two-Grid Block-Centered Finite Difference Method for the Nonlinear Time-Fractional Parabolic Equation. Journal of Scientific Computing, 2017, 72, 863-891.	2.3	34
8	Stability and Superconvergence of MAC Scheme for Stokes Equations on Nonuniform Grids. SIAM Journal on Numerical Analysis, 2017, 55, 1135-1158.	2.3	33
9	New SAV-pressure correction methods for the Navier-Stokes equations: stability and error analysis. Mathematics of Computation, 2022, 91, 141-167.	2.1	30
10	A parallel CGS block-centered finite difference method for a nonlinear time-fractional parabolic equation. Computer Methods in Applied Mechanics and Engineering, 2016, 308, 330-348.	6.6	29
11	A Crankâ€"Nicolson difference scheme for the time variable fractional mobileâ€"immobile advectionâ€"dispersion equation. Journal of Applied Mathematics and Computing, 2018, 56, 391-410.	2.5	28
12	On a SAV-MAC scheme for the Cahnâ€"Hilliardâ€"Navierâ€"Stokes phase-field model and its error analysis for the corresponding Cahnâ€"Hilliardâ€"Stokes case. Mathematical Models and Methods in Applied Sciences, 2020, 30, 2263-2297.	3.3	27
13	A highly efficient and accurate exponential semi-implicit scalar auxiliary variable (ESI-SAV) approach for dissipative system. Journal of Computational Physics, 2021, 447, 110703.	3.8	27
14	Block-Centered Finite Difference Method for Simulating Compressible Wormhole Propagation. Journal of Scientific Computing, 2018, 74, 1115-1145.	2.3	26
15	Two fast and efficient linear semi-implicit approaches with unconditional energy stability for nonlocal phase field crystal equation. Applied Numerical Mathematics, 2020, 150, 491-506.	2.1	24
16	A second-order finite difference scheme for quasilinear time fractional parabolic equation based on new fractional derivative. International Journal of Computer Mathematics, 2018, 95, 396-411.	1.8	20
17	A novel finite difference discrete scheme for the time fractional diffusion-wave equation. Applied Numerical Mathematics, 2018, 134, 17-30.	2.1	19
18	A two-grid block-centered finite difference method for nonlinear non-Fickian flow model. Applied Mathematics and Computation, 2016, 281, 300-313.	2.2	18

#	Article	IF	Citations
19	The fast scalar auxiliary variable approach with unconditional energy stability for nonlocal Cahnâ€“Hilliard equation. Numerical Methods for Partial Differential Equations, 2021, 37, 244-261.	3.6	17
20	Characteristic block-centred finite difference methods for nonlinear convection-dominated diffusion equation. International Journal of Computer Mathematics, 2017, 94, 386-404.	1.8	16
21	A second order Crankâ€“Nicolson scheme for fractional Cattaneo equation based on new fractional derivative. Applied Mathematics and Computation, 2017, 311, 361-374.	2.2	16
22	Characteristic block-centered finite difference method for simulating incompressible wormhole propagation. Computers and Mathematics With Applications, 2017, 73, 2171-2190.	2.7	14
23	A fast solution technique for finite element discretization of the spaceâ€“time fractional diffusion equation. Applied Numerical Mathematics, 2017, 119, 146-163.	2.1	13
24	A fast high-order compact difference method for the fractal mobile/immobile transport equation. International Journal of Computer Mathematics, 2020, 97, 1860-1883.	1.8	13
25	Step-by-step solving schemes based on scalar auxiliary variable and invariant energy quadratization approaches for gradient flows. Numerical Algorithms, 2022, 89, 65-86.	1.9	13
26	Superconvergence of a fully conservative finite difference method on non-uniform staggered grids for simulating wormhole propagation with the Darcyâ€“Brinkmanâ€“Forchheimer framework. Journal of Fluid Mechanics, 2019, 872, 438-471.	3.4	12
27	Superconvergence of Characteristics Marker and Cell Scheme for the Navier--Stokes Equations on Nonuniform Grids. SIAM Journal on Numerical Analysis, 2018, 56, 1313-1337.	2.3	11
28	Two alternating direction implicit spectral methods for two-dimensional distributed-order differential equation. Numerical Algorithms, 2019, 82, 321-347.	1.9	11
29	A block-centered finite difference method for the distributed-order time-fractional diffusion-wave equation. Applied Numerical Mathematics, 2018, 131, 123-139.	2.1	10
30	A high-order fully conservative block-centered finite difference method for the time-fractional advectionâ€“dispersion equation. Applied Numerical Mathematics, 2018, 124, 89-109.	2.1	10
31	Error analysis of the SAV Fourier-spectral method for the Cahn-Hilliard-Hele-Shaw system. Advances in Computational Mathematics, 2021, 47, 1.	1.6	9
32	A fastâ€high order compact difference method for the fractional cable equation. Numerical Methods for Partial Differential Equations, 2018, 34, 2237-2266.	3.6	8
33	A fully conservative block-centered finite difference method for simulating Darcy-Forchheimer compressible wormhole propagation. Numerical Algorithms, 2019, 82, 451-478.	1.9	8
34	A fully conservative blockâ€centered finite difference method for Darcyâ€“Forchheimer incompressible miscible displacement problem. Numerical Methods for Partial Differential Equations, 2020, 36, 66-85.	3.6	8
35	Efficient linear and unconditionally energy stable schemes for the modified phase field crystal equation. Science China Mathematics, 2022, 65, 2201-2218.	1.7	7
36	New efficient and unconditionally energy stable schemes for the Cahnâ€“Hilliardâ€“Brinkman system. Applied Mathematics Letters, 2022, 128, 107918.	2.7	7

#	ARTICLE	IF	CITATIONS
37	Two temporal second-order H1-Galerkin mixed finite element schemes for distributed-order fractional sub-diffusion equations. Numerical Algorithms, 2018, 79, 1107-1130.	1.9	6
38	Accurate and efficient algorithms with unconditional energy stability for the time fractional Cahnâ€“Hilliard and Allenâ€“Cahn equations. Numerical Methods for Partial Differential Equations, 2021, 37, 2613-2633.	3.6	6
39	Characteristic block-centered finite difference method for compressible miscible displacement in porous media. Applied Mathematics and Computation, 2017, 314, 391-407.	2.2	5
40	Stability and superconvergence of MAC schemes for time dependent Stokes equations on nonuniform grids. Journal of Mathematical Analysis and Applications, 2018, 466, 1499-1524.	1.0	5
41	A block-centred finite difference method for the distributed-order differential equation with Neumann boundary condition. International Journal of Computer Mathematics, 2019, 96, 622-639.	1.8	5
42	Stability and convergence based on the finite difference method for the nonlinear fractional cable equation on non-uniform staggered grids. Applied Numerical Mathematics, 2020, 152, 403-421.	2.1	5
43	Superconvergence of MAC Scheme for a Coupled Free Flow-Porous Media System with Heat Transport on Non-uniform Grids. Journal of Scientific Computing, 2022, 90, 1.	2.3	5
44	The finite volume method based on the Crouzeixâ€“Raviart element for a fracture model. Numerical Methods for Partial Differential Equations, 2019, 35, 1904-1927.	3.6	4
45	A blockâ€centered finite difference method for fractional Cattaneo equation. Numerical Methods for Partial Differential Equations, 2018, 34, 296-316.	3.6	3
46	A block-centered finite difference method for the nonlinear Sobolev equation on nonuniform rectangular grids. Applied Mathematics and Computation, 2019, 363, 124607.	2.2	3
47	Stability and superconvergence of efficient MAC schemes for fractional Stokes equation on non-uniform grids. Applied Numerical Mathematics, 2019, 138, 30-53.	2.1	3
48	Fast and efficient finite difference method for the distributed-order diffusion equation based on the staggered grids. Applied Numerical Mathematics, 2022, 174, 34-45.	2.1	3
49	Energy stability and convergence of the scalar auxiliary variable Fourierâ€spectral method for the viscous Cahnâ€“Hilliard equation. Numerical Methods for Partial Differential Equations, 2020, 36, 998-1011.	3.6	2
50	A Fast Finite Difference Method for a Continuous Static Linear Bond-Based Peridynamics Model of Mechanics. Journal of Scientific Computing, 2018, 74, 728-742.	2.3	1
51	Finite volume element methods for a multi-dimensional fracture model. Journal of Computational and Applied Mathematics, 2022, 406, 114028.	2.0	1
52	Modified marker and cell schemes for Stokes equations with Dirichlet boundary condition. Mathematical Methods in the Applied Sciences, 2022, 45, 10384-10407.	2.3	1
53	Stability and convergence of characteristic MAC scheme and post-processing for the Oseen equations on non-uniform grids. Applied Mathematics and Computation, 2019, 342, 94-111.	2.2	0
54	Error estimate of finite difference method for the nonlinear distributed-ordered diffusion equation on staggered grids. International Journal of Computer Mathematics, 0, , 1-0.	1.8	0