

Amin Shahsavar

List of Publications by Year in descending order

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183
papers

11,653
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16451

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183
all docs

183
docs citations

183
times ranked

4182
citing authors

#	ARTICLE	IF	CITATIONS
1	Thermo-hydraulic performance and entropy generation of biologically synthesized silver/water-ethylene glycol nano-fluid flow inside a rifled tube using two-phase mixture model. <i>Energy Sources, Part A: Recovery, Utilization and Environmental Effects</i> , 2023, 45, 4463-4480.	2.3	15
2	Two-phase mixture simulation of the performance of a grooved helical microchannel heat sink filled with biologically prepared water-silver nanofluid: Hydrothermal characteristics and irreversibility behavior. <i>Applied Thermal Engineering</i> , 2022, 202, 117848.	6.0	23
3	Effect of glass cover on the energy and exergy performance of a combined system including a building integrated photovoltaic/thermal system and a sensible rotary heat exchanger. <i>International Journal of Energy Research</i> , 2022, 46, 5050-5066.	4.5	14
4	Effect of nanoparticle shape on cooling performance of boehmite-alumina nanofluid in a helical heat sink for laminar and turbulent flow regimes. <i>International Journal of Mechanical Sciences</i> , 2022, 217, 107045.	6.7	19
5	A critical analysis on the energy and exergy performance of photovoltaic/thermal (PV/T) system: The role of nanofluids stability and synthesizing method. <i>Sustainable Energy Technologies and Assessments</i> , 2022, 51, 101887.	2.7	17
6	Using high-frequency ultrasonic and thermoelectric generators to enhance the performance of a photovoltaic module. <i>Journal of Cleaner Production</i> , 2022, 350, 131393.	9.3	10
7	Entropy generation characteristics of phase change material in a variable wavy walled triplex tube latent heat storage unit for battery thermal management system. <i>Journal of Energy Storage</i> , 2022, 51, 104374.	8.1	8
8	Numerical assessment on the hydrothermal behaviour and entropy generation characteristics of boehmite alumina nanofluid flow through a concentrating photovoltaic/thermal system considering various shapes for nanoparticle. <i>Sustainable Energy Technologies and Assessments</i> , 2022, 52, 102143.	2.7	3
9	Energy-saving owing to using PCM into buildings: Considering of hot and cold climate region. <i>Sustainable Energy Technologies and Assessments</i> , 2022, 52, 102112.	2.7	6
10	A parametric assessing and intelligent forecasting of the energy and exergy performances of a dish concentrating photovoltaic/thermal collector considering six different nanofluids and applying two meticulous soft computing paradigms. <i>Renewable Energy</i> , 2022, 193, 149-166.	8.9	5
11	Evaluation of entropy generation characteristics of boehmite-alumina nanofluid with different shapes of nanoparticles in a helical heat sink. <i>International Journal of Mechanical Sciences</i> , 2022, 225, 107338.	6.7	17
12	The entropy generation analysis of the influence of using fins with tip clearance on the thermal management of the batteries with phase change material: Application a new gradient-based ensemble machine learning approach. <i>Engineering Analysis With Boundary Elements</i> , 2022, 140, 432-446.	3.7	16
13	Experimental exploration of rheological behavior of polyethylene glycol-carbon dot nanofluid: Introducing a robust artificial intelligence paradigm optimized with unscented Kalman filter technique. <i>Journal of Molecular Liquids</i> , 2022, 358, 119198.	4.9	13
14	Investigation on two-phase fluid mixture flow, heat transfer and entropy generation of a non-Newtonian water-CMC/CuO nanofluid inside a twisted tube with variable twist pitch: Numerical and evolutionary machine learning simulation. <i>Engineering Analysis With Boundary Elements</i> , 2022, 140, 322-337.	3.7	21
15	Coupled CFD and 3E (Energy, Exergy and Economical) analysis of using windbreak walls in heller type cooling towers. <i>Journal of Cleaner Production</i> , 2022, 358, 131550.	9.3	5
16	Energy saving in buildings by using the exhaust air and phase change material for cooling of photovoltaic panels. <i>Journal of Building Engineering</i> , 2022, 53, 104520.	3.4	3
17	Comparative energy, exergy, environmental, exergoeconomic, and enviroeconomic analysis of building integrated photovoltaic/thermal, earth-air heat exchanger, and hybrid systems. <i>Journal of Cleaner Production</i> , 2022, 362, 132510.	9.3	20
18	Assessment of thermal conductivity of polyethylene glycol-carbon dot nanofluid through a combined experimental-data mining investigation. <i>Journal of Materials Research and Technology</i> , 2022, 19, 2695-2704.	5.8	8

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19	Two-phase mixture numerical and soft computing-based simulation of forced convection of biologically prepared water-silver nanofluid inside a double-pipe heat exchanger with converging sinusoidal wall: Hydrothermal performance and entropy generation analysis. <i>Engineering Analysis With Boundary Elements</i> , 2022, 143, 43-60.	3.7	5
20	Effects of number of objective functions on the optimization of a hybrid building integrated photovoltaic/thermal-heat recovery wheel unit. <i>Sustainable Energy Technologies and Assessments</i> , 2022, 53, 102365.	2.7	2
21	Energy and exergy analysis and multi-objective optimization of using combined vortex tube-photovoltaic/thermal system in city gate stations. <i>Renewable Energy</i> , 2022, 196, 1017-1028.	8.9	6
22	Using finite volume method for simulating the natural convective heat transfer of nano-fluid flow inside an inclined enclosure with conductive walls in the presence of a constant temperature heat source. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2021, 580, 123035.	2.6	35
23	Numerical investigation of laminar flow of biological nanofluid in a rifled tube using two-phase mixture model: first-law and second-law analyses and geometry optimization. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 146, 955-966.	3.6	2
24	Thermal conductivity of ethylene glycol-based nanofluid containing SiO ₂ nanoadditives: experimental data and modeling through curve fitting. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 146, 1101-1109.	3.6	7
25	An experimental study on the cooling efficiency of magnetite-water nanofluid in a twisted tube exposed to a rotating magnetic field. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 146, 1893-1909.	3.6	4
26	Experimental investigation of the hydrothermal aspects of water-Fe ₃ O ₄ nanofluid inside a twisted tube. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 143, 801-810.	3.6	19
27	An investigation on the influence of the shape of the vortex generator on fluid flow and turbulent heat transfer of hybrid nanofluid in a channel. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 143, 1425-1438.	3.6	36
28	Hydrothermal and entropy generation specifications of a hybrid ferronanofluid in microchannel heat sink embedded in CPUs. <i>Chinese Journal of Chemical Engineering</i> , 2021, 32, 27-38.	3.5	18
29	The entropy generation analysis of forward and backward laminar water flow in a plate-pin-fin heatsink considering three different splitters. <i>International Communications in Heat and Mass Transfer</i> , 2021, 120, 105026.	5.6	25
30	Entropy and thermal performance analysis of PCM melting and solidification mechanisms in a wavy channel triplex-tube heat exchanger. <i>Renewable Energy</i> , 2021, 165, 52-72.	8.9	36
31	Experimental evaluation of energy and exergy performance of a nanofluid-based photovoltaic/thermal system equipped with a sheet-and-sinusoidal serpentine tube collector. <i>Journal of Cleaner Production</i> , 2021, 287, 125064.	9.3	50
32	Free convection of non-Newtonian nanofluid flow inside an eccentric annulus from the point of view of first-law and second-law of thermodynamics. <i>ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik</i> , 2021, 101, e202000266.	1.6	11
33	Numerical study of the possibility of improving the hydrothermal performance of an elliptical double-pipe heat exchanger through the simultaneous use of twisted tubes and non-Newtonian nanofluid. <i>Journal of Thermal Analysis and Calorimetry</i> , 2021, 143, 2825-2840.	3.6	20
34	Numerical simulation of nanofluid convective heat transfer in an oblique cavity with conductive edges equipped with a constant temperature heat source: Entropy production analysis. <i>Computers and Mathematics With Applications</i> , 2021, 81, 725-736.	2.7	11
35	Application of Artificial Intelligence Techniques in Prediction of Energetic Performance of a Hybrid System Consisting of an Earth-Air Heat Exchanger and a Building-Integrated Photovoltaic/Thermal System. <i>Journal of Solar Energy Engineering, Transactions of the ASME</i> , 2021, 143, .	1.8	9
36	Numerical investigation of the effect of corrugation profile on the hydrothermal characteristics and entropy generation behavior of laminar forced convection of non-Newtonian water/CMC-CuO nanofluid flow inside a wavy channel. <i>International Communications in Heat and Mass Transfer</i> , 2021, 121, 105117.	5.6	38

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37	Thermal-hydraulic analysis and irreversibility of the MWCNTs-SiO ₂ /EG-H ₂ O non-Newtonian hybrid nanofluids inside a zigzag micro-channels heat sink. <i>International Communications in Heat and Mass Transfer</i> , 2021, 122, 105158.	5.6	37
38	Experimental study of the effect of sheet-and-sinusoidal tube collector on the energetic and exergetic performance of a photovoltaic-thermal unit filled with biologically synthesized water/glycerol-silver nanofluid. <i>Applied Thermal Engineering</i> , 2021, 186, 116518.	6.0	13
39	A comparative experimental investigation of energetic and exergetic performances of water/magnetite nanofluid-based photovoltaic/thermal system equipped with finned and unfinned collectors. <i>Energy</i> , 2021, 220, 119714.	8.8	37
40	The effect of using connecting holes on heat transfer and entropy generation behaviors in a micro channels heat sink cooled with biological silver/water nanofluid. <i>International Communications in Heat and Mass Transfer</i> , 2021, 123, 104929.	5.6	34
41	Influence of dome shape on flow structure, natural convection and entropy generation in enclosures at different inclinations: A comparative study. <i>International Journal of Mechanical Sciences</i> , 2021, 197, 106321.	6.7	13
42	Experimental investigation of the usability of the rifled serpentine tube to improve energy and exergy performances of a nanofluid-based photovoltaic/thermal system. <i>Renewable Energy</i> , 2021, 170, 410-425.	8.9	48
43	Comparison of the performance of different designs of a combined system consisting of a photovoltaic thermal unit and a sensible rotary heat exchanger. <i>Sustainable Energy Technologies and Assessments</i> , 2021, 45, 101203.	2.7	2
44	Natural convection and entropy generation of Ag-water nanofluid in a finned horizontal annulus: A particular focus on the impact of fin numbers. <i>International Communications in Heat and Mass Transfer</i> , 2021, 125, 105349.	5.6	24
45	CFD simulation of the impact of tip clearance on the hydrothermal performance and entropy generation of a water-cooled pin-fin heat sink. <i>International Communications in Heat and Mass Transfer</i> , 2021, 126, 105400.	5.6	29
46	Introducing two scenarios to enhance the vacuum U-tube solar collector efficiency by considering economic criterion. <i>Journal of the Taiwan Institute of Chemical Engineers</i> , 2021, 124, 228-237.	5.3	17
47	Nanofluid-PCM heat sink for building integrated concentrated photovoltaic with thermal energy storage and recovery capability. <i>Sustainable Energy Technologies and Assessments</i> , 2021, 46, 101223.	2.7	23
48	Numerical investigation of a double-pipe latent heat thermal energy storage with sinusoidal wavy fins during melting and solidification. <i>International Journal of Energy Research</i> , 2021, 45, 20934-20948.	4.5	13
49	Energetic and exergetic performances of a nanofluid-based photovoltaic/thermal system equipped with a sheet-and-grooved serpentine tube collector: Indoor experimental tests. <i>Solar Energy</i> , 2021, 225, 918-933.	6.1	23
50	Thermo-hydraulic performance of nanofluids in a bionic heat sink. <i>International Communications in Heat and Mass Transfer</i> , 2021, 127, 105492.	5.6	48
51	The effect of inlet/outlet number and arrangement on hydrothermal behavior and entropy generation of the laminar water flow in a pin-fin heat sink. <i>International Communications in Heat and Mass Transfer</i> , 2021, 127, 105500.	5.6	25
52	Experimental evaluation and development of predictive models for rheological behavior of aqueous Fe ₃ O ₄ ferrofluid in the presence of an external magnetic field by introducing a novel grid optimization based-Kernel ridge regression supported by sensitivity analysis. <i>Powder Technology</i> , 2021, 393, 1-11.	4.2	27
53	Experimental assessment on convection heat transfer characteristics of aqueous magnetite ferrofluid in a rifled tube under a rotating magnetic field. <i>International Communications in Heat and Mass Transfer</i> , 2021, 129, 105673.	5.6	5
54	Implications of boundary conditions on natural convective heat transfer of molten phase change material inside enclosures. <i>International Journal of Energy Research</i> , 2021, 45, 7631-7650.	4.5	9

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55	Influence of cerium oxide nanoparticles on thermal conductivity of antifreeze. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 225-236.	3.6	19
56	Characterization of the nanoparticles, the stability analysis and the evaluation of a new hybrid nano-oil thermal conductivity. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 1553-1564.	3.6	21
57	Effect of a porous medium on flow and mixed convection heat transfer of nanofluids with variable properties in a trapezoidal enclosure. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 741-754.	3.6	28
58	Application of PSO-ANN modelling for predicting the exergetic performance of a building integrated photovoltaic/thermal system. <i>Engineering With Computers</i> , 2020, 36, 633-646.	6.1	29
59	Predicting thermophysical properties and flow characteristics of nanofluids using intelligent methods: focusing on ANN methods. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 140, 501-525.	3.6	22
60	The effect of inlet temperature on the irreversibility characteristics of non-Newtonian hybrid nano-fluid flow inside a minichannel counter-current hairpin heat exchanger. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 3789-3801.	3.6	4
61	The effects of vertical and horizontal sources on heat transfer and entropy generation in an inclined triangular enclosure filled with non-Newtonian fluid and subjected to magnetic field. <i>Powder Technology</i> , 2020, 364, 924-942.	4.2	16
62	Multi-objective optimization of a photovoltaic thermal-compound sensible rotary heat exchanger system using exergo-economic and enviro-economic approaches. <i>Journal of Environmental Management</i> , 2020, 254, 109767.	7.8	16
63	Performance evaluation of melting/solidification mechanism in a variable wave-length wavy channel double-tube latent heat storage system. <i>Journal of Energy Storage</i> , 2020, 27, 101063.	8.1	61
64	Thermal performance evaluation of non-uniform fin array in a finned double-pipe latent heat storage system. <i>Energy</i> , 2020, 193, 116800.	8.8	127
65	Viscosity, cloud point, freezing point and flash point of zinc oxide/SAE50 nanolubricant. <i>Journal of Molecular Liquids</i> , 2020, 298, 112045.	4.9	25
66	Energy and economic evaluation and multicriteria optimization of different arrangements of integrated photovoltaic thermal and heat recovery wheel system. <i>International Journal of Energy Research</i> , 2020, 44, 1488-1505.	4.5	9
67	Effect of porous medium and nanoparticles presences in a counter-current triple-tube composite porous/nano-PCM system. <i>Applied Thermal Engineering</i> , 2020, 167, 114777.	6.0	108
68	An experimental investigation on the rheological behavior of nanofluids made by suspending multi-walled carbon nanotubes in liquid paraffin. <i>Journal of Molecular Liquids</i> , 2020, 300, 112269.	4.9	44
69	The impact of sonication and stirring durations on the thermal conductivity of alumina-liquid paraffin nanofluid: An experimental assessment. <i>Powder Technology</i> , 2020, 360, 1134-1142.	4.2	68
70	Incorporating novel heat recovery units into an AHU for energy demand reduction-exergy analysis. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 2821-2830.	3.6	66
71	Numerical investigation on the effect of four constant temperature pipes on natural cooling of electronic heat sink by nanofluids: A multifunctional optimization. <i>Advanced Powder Technology</i> , 2020, 31, 416-432.	4.1	39
72	A numerical investigation on the influence of nanoadditive shape on the natural convection and entropy generation inside a rectangle-shaped finned concentric annulus filled with boehmite alumina nanofluid using two-phase mixture model. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 141, 915-930.	3.6	27

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73	A review of melting and freezing processes of PCM/nano-PCM and their application in energy storage. <i>Energy</i> , 2020, 211, 118698.	8.8	271
74	Two-phase mixture modeling of turbulent forced convective flow of water-silver nanofluid inside a rifled tube: hydrothermal characteristics and irreversibility behavior. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, , 1.	3.6	3
75	Experimental evaluation of novel photovoltaic/thermal systems using serpentine cooling tubes with different cross-sections of circular, triangular and rectangular. <i>Energy</i> , 2020, 208, 118409.	8.8	53
76	Effects of the porous medium and water-silver biological nanofluid on the performance of a newly designed heat sink by using first and second laws of thermodynamics. <i>Chinese Journal of Chemical Engineering</i> , 2020, 28, 2928-2937.	3.5	22
77	Turbulent forced convection and entropy production of a nanofluid in a solar collector considering various shapes for nanoparticles. <i>International Communications in Heat and Mass Transfer</i> , 2020, 117, 104804.	5.6	31
78	On evaluation of magnetic field effect on the formation of nanoparticles clusters inside aqueous magnetite nanofluid: An experimental study and comprehensive modeling. <i>Journal of Molecular Liquids</i> , 2020, 312, 113378.	4.9	14
79	Numerical study of melting and solidification in a wavy double-pipe latent heat thermal energy storage system. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 141, 1785-1799.	3.6	42
80	Using of Artificial Neural Networks (ANNs) to predict the thermal conductivity of Zinc Oxide-Silver (50%-50%)/Water hybrid Newtonian nanofluid. <i>International Communications in Heat and Mass Transfer</i> , 2020, 116, 104645.	5.6	106
81	Thermo-hydraulic characteristics investigation of nanofluid heat transfer in a microchannel with super hydrophobic surfaces under non-uniform magnetic field using Incompressible Preconditioned Lattice Boltzmann Method (IPLBM). <i>Physica A: Statistical Mechanics and Its Applications</i> , 2020, 553, 124669.	2.6	16
82	Natural convection and entropy generation of a nanofluid around a circular baffle inside an inclined square cavity under thermal radiation and magnetic field effects. <i>International Communications in Heat and Mass Transfer</i> , 2020, 116, 104650.	5.6	95
83	Machine learning predictive models for optimal design of building-integrated photovoltaic-thermal collectors. <i>International Journal of Energy Research</i> , 2020, 44, 5675-5695.	4.5	24
84	Experimental investigation of heat and moisture transfer performance of CaCl ₂ /H ₂ O-SiO ₂ nanofluid in a gas-liquid microporous hollow fiber membrane contactor. <i>International Communications in Heat and Mass Transfer</i> , 2020, 113, 104533.	5.6	31
85	Sonication time efficacy on Fe ₃ O ₄ -liquid paraffin magnetic nanofluid thermal conductivity: An experimental evaluation. <i>Ultrasonics Sonochemistry</i> , 2020, 64, 105004.	8.2	27
86	Energy and Exergy Analysis of Using Turbulator in a Parabolic Trough Solar Collector Filled with Mesoporous Silica Modified with Copper Nanoparticles Hybrid Nanofluid. <i>Energies</i> , 2020, 13, 2946.	3.1	34
87	Non-Newtonian nanofluid natural convection in a U-shaped cavity under magnetic field. <i>International Journal of Mechanical Sciences</i> , 2020, 186, 105887.	6.7	60
88	Numerical investigation of natural convection behavior of molten PCM in an enclosure having rectangular and tree-like branching fins. <i>Energy</i> , 2020, 207, 118223.	8.8	97
89	A novel comparative experimental study on rheological behavior of mono & hybrid nanofluids concerned graphene and silica nano-powders: Characterization, stability and viscosity measurements. <i>Powder Technology</i> , 2020, 366, 216-229.	4.2	120
90	Numerical simulation of critical heat flux in forced boiling of a flow in an inclined tube with different angles. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020, 139, 2859-2880.	3.6	4

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91	Natural convective heat transfer and entropy generation of alumina/water nanofluid in a tilted enclosure with an elliptic constant temperature: Applying magnetic field and radiation effects. <i>International Journal of Mechanical Sciences</i> , 2020, 174, 105470.	6.7	130
92	Two-phase mixture simulation of the effect of fin arrangement on first and second law performance of a bifurcation microchannels heatsink operated with biologically prepared water-Ag nanofluid. <i>International Communications in Heat and Mass Transfer</i> , 2020, 114, 104554.	5.6	24
93	Effects of sonication duration and nanoparticles concentration on thermal conductivity of silica-ethylene glycol nanofluid under different temperatures: An experimental study. <i>Powder Technology</i> , 2020, 367, 464-473.	4.2	73
94	Experimental evaluating the rheological behavior of ethylene glycol under graphene nanosheets loading. <i>Powder Technology</i> , 2020, 367, 788-795.	4.2	11
95	Numerical assessment on the hydrothermal behavior and irreversibility of MgO-Ag/water hybrid nanofluid flow through a sinusoidal hairpin heat-exchanger. <i>International Communications in Heat and Mass Transfer</i> , 2020, 115, 104628.	5.6	51
96	Curve-fitting on experimental thermal conductivity of motor oil under influence of hybrid nano additives containing multi-walled carbon nanotubes and zinc oxide. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 535, 122128.	2.6	30
97	Forced convection around horizontal tubes bundles of a heat exchanger using a two-phase mixture model: Effects of nanofluid and tubes Configuration. <i>International Journal of Mechanical Sciences</i> , 2019, 161-162, 105056.	6.7	10
98	Effect of fuel jet arrangement on the mixing rate inside trapezoidal cavity flame holder at supersonic flow. <i>International Journal of Hydrogen Energy</i> , 2019, 44, 22231-22239.	7.1	70
99	Developing dissimilar artificial neural networks (ANNs) to prediction the thermal conductivity of MWCNT-TiO ₂ /Water-ethylene glycol hybrid nanofluid. <i>Powder Technology</i> , 2019, 355, 602-610.	4.2	162
100	An experimental investigation for study the rheological behavior of water-carbon nanotube/magnetite nanofluid subjected to a magnetic field. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 534, 122129.	2.6	60
101	Numerical investigation of forced convection heat transfer and flow irreversibility in a novel heatsink with helical microchannels working with biologically synthesized water-silver nano-fluid. <i>International Communications in Heat and Mass Transfer</i> , 2019, 108, 104324.	5.6	50
102	Comprehensive preference learning and feature validity for designing energy-efficient residential buildings using machine learning paradigms. <i>Applied Soft Computing Journal</i> , 2019, 84, 105748.	7.2	73
103	Natural convection and entropy generation of a nanofluid in two connected inclined triangular enclosures under magnetic field effects. <i>International Communications in Heat and Mass Transfer</i> , 2019, 108, 104309.	5.6	50
104	Numerical investigation of Al_2O_3 -AlOOH nano-fluid convection performance in a wavy channel considering various shapes of nanoadditives. <i>Powder Technology</i> , 2019, 345, 649-657.	4.2	65
105	Entropy generation of boehmite alumina nanofluid flow through a minichannel heat exchanger considering nanoparticle shape effect. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 521, 724-736.	2.6	103
106	Wavy channels triple-tube LHS unit with sinusoidal variable wavelength in charging/discharging mechanism. <i>International Communications in Heat and Mass Transfer</i> , 2019, 107, 93-105.	5.6	62
107	Multi-objective energy and exergy optimization of different configurations of hybrid earth-air heat exchanger and building integrated photovoltaic/thermal system. <i>Energy Conversion and Management</i> , 2019, 195, 1098-1110.	9.2	81
108	Laminar forced convection performance of non-Newtonian water-CNT/Fe ₃ O ₄ nano-fluid inside a minichannel hairpin heat exchanger: Effect of inlet temperature. <i>Powder Technology</i> , 2019, 354, 247-258.	4.2	29

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109	Energy and exergy analysis of two novel hybrid solar photovoltaic geothermal energy systems incorporating a building integrated photovoltaic thermal system and an earth air heat exchanger system. <i>Solar Energy</i> , 2019, 188, 83-95.	6.1	56
110	Heat transfer reduction in buildings by embedding phase change material in multi-layer walls: Effects of repositioning, thermophysical properties and thickness of PCM. <i>Energy Conversion and Management</i> , 2019, 195, 43-56.	9.2	206
111	Finite Volume Simulation of mixed convection in an inclined lid-driven cavity filled with nanofluids: Effects of a hot elliptical centric cylinder, cavity angle and volume fraction of nanoparticles. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 527, 121122.	2.6	40
112	Robust Weighted Least Squares Support Vector Regression algorithm to estimate the nanofluid thermal properties of water/graphene Oxide-Silicon carbide mixture. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 525, 1418-1428.	2.6	32
113	The feasibility of genetic programming and ANFIS in prediction energetic performance of a building integrated photovoltaic thermal (BIPVT) system. <i>Solar Energy</i> , 2019, 183, 293-305.	6.1	44
114	Numerical assessment into the hydrothermal and entropy generation characteristics of biological water-silver nano-fluid in a wavy walled microchannel heat sink. <i>International Communications in Heat and Mass Transfer</i> , 2019, 104, 118-126.	5.6	105
115	Numerical investigation of non-Newtonian water-CMC/CuO nanofluid flow in an offset strip-fin microchannel heat sink: Thermal performance and thermodynamic considerations. <i>Applied Thermal Engineering</i> , 2019, 155, 247-258.	6.0	90
116	Rheological properties of SWCNT/EG mixture by a new developed optimization approach of LS-Support Vector Regression according to empirical data. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 525, 912-920.	2.6	8
117	Impact of oscillating magnetic field on the thermal-conductivity of water-Fe ₃ O ₄ and water-Fe ₃ O ₄ /CNT ferro-fluids: Experimental study. <i>Journal of Magnetism and Magnetic Materials</i> , 2019, 484, 258-265.	2.3	56
118	The effects of tape insert material on the flow and heat transfer in a nanofluid-based double tube heat exchanger: Two-phase mixture model. <i>International Journal of Mechanical Sciences</i> , 2019, 156, 397-409.	6.7	87
119	Effect of magnetic field on laminar forced convective heat transfer of MWCNT-Fe ₃ O ₄ /water hybrid nanofluid in a heated tube. <i>Journal of Thermal Analysis and Calorimetry</i> , 2019, 137, 1809-1825.	3.6	50
120	Analytical Solution of Heat Conduction in a Symmetrical Cylinder Using the Solution Structure Theorem and Superposition Technique. <i>Symmetry</i> , 2019, 11, 1522.	2.2	5
121	Second law analysis of turbulent convection flow of boehmite alumina nanofluid inside a double-pipe heat exchanger considering various shapes for nanoparticle. <i>Journal of Thermal Analysis and Calorimetry</i> , 2019, 135, 1521-1532.	3.6	46
122	Appraising influence of COOH-MWCNTs on thermal conductivity of antifreeze using curve fitting and neural network. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 514, 36-45.	2.6	106
123	Experimental investigation and develop ANNs by introducing the suitable architectures and training algorithms supported by sensitivity analysis: Measure thermal conductivity and viscosity for liquid paraffin based nanofluid containing Al ₂ O ₃ nanoparticles. <i>Journal of Molecular Liquids</i> , 2019, 276, 850-860.	4.9	111
124	Effect of alumina nano-powder on the convection and the entropy generation of water inside an inclined square cavity subjected to a magnetic field: Uniform and non-uniform temperature boundary conditions. <i>International Journal of Mechanical Sciences</i> , 2019, 152, 99-117.	6.7	78
125	Evaluating the effect of temperature and concentration on the thermal conductivity of ZnO-TiO ₂ /EG hybrid nanofluid using artificial neural network and curve fitting on experimental data. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2019, 519, 209-216.	2.6	143
126	A novel comprehensive experimental study concerned synthesizes and prepare liquid paraffin-Fe ₃ O ₄ mixture to develop models for both thermal conductivity & viscosity: A new approach of GMDH type of neural network. <i>International Journal of Heat and Mass Transfer</i> , 2019, 131, 432-441.	4.8	133

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127	Studies on optimum fins number in PCM-based heat sinks. <i>Energy</i> , 2019, 171, 1088-1099.	8.8	150
128	Prediction of energetic performance of a building integrated photovoltaic/thermal system thorough artificial neural network and hybrid particle swarm optimization models. <i>Energy Conversion and Management</i> , 2019, 183, 137-148.	9.2	105
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