Jihong Zhu

List of Publications by Year
in descending order

151 papers	1,341 citations	489802 18 h-index	466096 32 g-index
152 all docs	152 docs citations	152 times ranked	1267 citing authors

#	Article	IF	Citations
1	A novel calculation and simulation method on missile killing effect. International Journal of Modeling, Simulation, and Scientific Computing, 2023, 14, .	0.9	1
2	Model predictive guidance for active aircraft protection from a homing missile. IET Control Theory and Applications, 2022, 16, 208-218.	1.2	9
3	A Novel Dual Buck and Boost Transformer-Less Single-Phase Grid-Tied Inverter. IEEE Transactions on Power Electronics, 2022, 37, 4211-4224.	5.4	9
4	Boosting 3D Adversarial Attacks With Attacking on Frequency. IEEE Access, 2022, 10, 50974-50984.	2.6	15
5	Secure Transmit Beamforming for Radar-Communication System Without Eavesdropper CSI. IEEE Transactions on Vehicular Technology, 2022, 71, 9794-9804.	3.9	1
6	Design of optimal trajectory transition controller for thrust-vectored V/STOL aircraft. Science China Information Sciences, 2021, 64, 1.	2.7	6
7	Cooperative prediction guidance law in target-attacker-defender scenario. Science China Information Sciences, 2021, 64, 1.	2.7	5
8	Enhanced Fault-Tolerant Model Predictive Current Control for a Five-Phase PM Motor With Continued Modulation. IEEE Transactions on Power Electronics, 2021, 36, 3236-3246.	5.4	34
9	Noncertainty Equivalent Adaptive Backstepping Control for Advanced Fighter Subject to Unsteady Effects and Input Constraints. International Journal of Aerospace Engineering, 2021, 2021, 1-18.	0.5	0
10	Multi‐scale audio super resolution via deep pyramid wavelet convolutional neural network. Electronics Letters, 2021, 57, 520-522.	0.5	1
11	Surface-to-air missile sites detection agent with remote sensing images. Science China Information Sciences, 2021, 64, 1.	2.7	5
12	Robust optimal transition maneuvers control for tail‐sitter unmanned aerial vehicles. International Journal of Robust and Nonlinear Control, 2021, 31, 8007-8029.	2.1	7
13	Dynamic Transition Corridors and Control Strategy of a Rotor-Blown-Wing Tail-Sitter. Journal of Guidance, Control, and Dynamics, 2021, 44, 1836-1852.	1.6	8
14	Online identification of aerodynamics with fast time‐varying features using Kalman filter. IET Control Theory and Applications, 2021, 15, 272-280.	1.2	5
15	Optimal Launch Time Selection in Target-Missile-Defender Scenario. , 2021, , .		0
16	Impact Angle Control Guidance to Intercept Moving Targets by Virtual Target Technique. International Journal of Aerospace Engineering, 2021, 2021, 1-12.	0.5	1
17	Simplified Fault-Tolerant Model Predictive Control for a Five-Phase Permanent-Magnet Motor With Reduced Computation Burden. IEEE Transactions on Power Electronics, 2020, 35, 3850-3858.	5.4	75
18	A computational-geometry-based 3-dimensional guidance law to control impact time and angle. Aerospace Science and Technology, 2020, 98, 105672.	2.5	29

#	Article	IF	Citations
19	A Novel Finite-Control-Set Model Predictive Current Control for Five-Phase PM Motor With Continued Modulation. IEEE Transactions on Power Electronics, 2020, 35, 7261-7270.	5.4	45
20	A Geometry-Based Guidance Law to Control Impact Time and Angle under Variable Speeds. Mathematics, 2020, 8, 1029.	1.1	3
21	Multivector Predictive Current Control for Five-Phase PM Motor by Using Hybrid Duty Modulation Technology. IEEE Transactions on Transportation Electrification, 2020, 6, 1603-1612.	5.3	20
22	Robust proportional incremental nonlinear dynamic inversion control of a flying-wing tailsitter. Proceedings of the Institution of Mechanical Engineers, Part G: Journal of Aerospace Engineering, 2020, 234, 2274-2295.	0.7	10
23	A Spline Kernel-Based Approach for Nonlinear System Identification with Dimensionality Reduction. Electronics (Switzerland), 2020, 9, 940.	1.8	2
24	Reachability-based cooperative strategy for intercepting a highly maneuvering target using inferior missiles. Aerospace Science and Technology, 2020, 106, 106057.	2.5	12
25	Thrust vectoring control of vertical/short takeoff and landing aircraft. Science China Information Sciences, 2020, 63, 1.	2.7	2
26	INDI-based transitional flight control and stability analysis of a tail-sitter UAV. , 2020, , .		5
27	A Reinforcement Learning System for Fault Detection and Diagnosis in Mechatronic Systems. CMES - Computer Modeling in Engineering and Sciences, 2020, 124, 1119-1130.	0.8	1
28	An unmanned air combat system based on swarm intelligence. Scientia Sinica Informationis, 2020, 50, 363-374.	0.2	10
29	Hybrid Modulation Fault-Tolerant Control of Open-End Windings Linear Vernier Permanent-Magnet Motor With Floating Capacitor Inverter. IEEE Transactions on Power Electronics, 2019, 34, 2563-2572.	5.4	41
30	Online Performance-Based Adaptive Fuzzy Dynamic Surface Control for Nonlinear Uncertain Systems Under Input Saturation. IEEE Transactions on Fuzzy Systems, 2019, 27, 209-220.	6.5	23
31	Design and hovering control of a twin rotor tail-sitter UAV. Science China Information Sciences, 2019, 62, 1.	2.7	10
32	LPV Modeling and Identification of Unsteady Aerodynamics for Fast Maneuvering Aircrafts. IEEE Access, 2019, 7, 92436-92443.	2.6	3
33	An Efficient Hierarchical Identification Method With Kernel-Based SVM for Equivalent Systems of Aircrafts. IEEE Access, 2019, 7, 83243-83250.	2.6	4
34	Design and Performance Analysis of a Scaled 3-Bearing Swivel Duct Nozzle. , 2019, , .		0
35	Reliability evaluation of modular multilevel converter based on Markov model. Journal of Modern Power Systems and Clean Energy, 2019, 7, 1355-1363.	3.3	10
36	A novel two-loop large offset tracking control of an uncertain nonlinear system with input constraints. Fuzzy Sets and Systems, 2019, 374, 82-99.	1.6	5

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37	Stability Analysis of Tailsitters in Vertical Takeoff and Landing Flights. Journal of Aircraft, 2019, 56, 1487-1500.	1.7	10
38	Model error correction in data assimilation by integrating neural networks. Big Data Mining and Analytics, 2019, 2, 83-91.	7.5	18
39	Progressive identification of lateral nonlinear unsteady aerodynamics from wind tunnel test data. Science China Information Sciences, 2019, 62, 1.	2.7	1
40	Aerodynamic shape optimization using a novel optimizer based on machine learning techniques. Aerospace Science and Technology, 2019, 86, 826-835.	2.5	108
41	Twofold Fail-Work Remedy for Reconfigurable Driver and Windings of Four-Phase Permanent Magnet Fault-Tolerant Motor System. IEEE Transactions on Power Electronics, 2019, 34, 7763-7774.	5.4	2
42	Modified Flux Linkage Observer for Sensorless Direct Thrust Force Control of Linear Vernier Permanent Magnet Motor. IEEE Transactions on Power Electronics, 2019, 34, 7800-7811.	5.4	25
43	Predictive Guidance Strategies for Active Aircraft Defense. , 2019, , .		5
44	Integrated Missile Guidance and Control: A Novel Explicit Reference Governor Using a Disturbance Observer. IEEE Transactions on Industrial Electronics, 2019, 66, 5487-5496.	5.2	30
45	Fault-Tolerant Direct Thrust Force Control for a Dual Inverter Fed Open-End Winding Linear Vernier Permanent-Magnet Motor Using Improved SVPWM. IEEE Transactions on Industrial Electronics, 2018, 65, 7458-7467.	5.2	60
46	Parabola–trapezoid and staircase current supply methods for PMBLM with full inverter utility and reduced torque ripple. IET Electric Power Applications, 2018, 12, 527-538.	1.1	0
47	Design to Reduce Rotor Losses in Fault-Tolerant Permanent-Magnet Machines. IEEE Transactions on Industrial Electronics, 2018, 65, 8476-8487.	5.2	32
48	Active Disturbance Rejection Control of a Flying-Wing Tailsitter in Hover Flight. , 2018, , .		8
49	Dynamic modeling and control method of a new concept wing-disk aircraft. MATEC Web of Conferences, 2018, 189, 03015.	0.1	0
50	A More Scalable Scheduling Algorithm for FPGA-based Time-Triggered Network. , 2018, , .		1
51	Missile aerodynamic design using reinforcement learning and transfer learning. Science China Information Sciences, 2018, 61, 1.	2.7	5
52	Adaptive Attitude Control for a Tail-Sitter UAV with Single Thrust-Vectored Propeller. , 2018, , .		8
53	Learning Transferable UAV for Forest Visual Perception. , 2018, , .		6
54	Centralized Predictive Control Allocation Scheme for V/STOL Aircrafts. , 2017, , .		0

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55	Improving the Resolution of 3D-Printed Molds for Microfluidics by Iterative Casting-Shrinkage Cycles. Analytical Chemistry, 2017, 89, 2227-2231.	3.2	15
56	Local mechanical behavior mapping of a biopolymer blend using nanoindentation, finite element computation, and simplex optimization strategy. Journal of Applied Polymer Science, 2017, 134, .	1.3	3
57	A Reconfigurable drive topology for fault tolerance. , 2017, , .		0
58	Observer-based dynamic surface control for high-performance aircraft subjected to unsteady aerodynamics and actuator saturation. Proceedings of the Institution of Mechanical Engineers Part I: Journal of Systems and Control Engineering, 2017, 231, 481-494.	0.7	5
59	Inverse dynamic modeling and analysis of a coaxial helicopter's swashplate mechanism. Mechanism and Machine Theory, 2017, 113, 208-230.	2.7	10
60	Design and Analysis of a New HTS Electromagnetic Screw. IEEE Transactions on Magnetics, 2017, 53, 1-4.	1.2	8
61	Longitudinal high incidence unsteady aerodynamic modeling for advanced combat aircraft configuration from wind tunnel data. Science China Information Sciences, 2017, 60, 1.	2.7	5
62	Target detection and tracking in infrared video. Proceedings of SPIE, 2017, , .	0.8	1
63	Identification of robotic systems with hysteresis using Nonlinear AutoRegressive eXogenous input models. International Journal of Advanced Robotic Systems, 2017, 14, 172988141770584.	1.3	9
64	Flight controller design and demonstration of a thrust-vectored tailsitter. , 2017, , .		5
65	Research on Intercepting Strategy of Multiple Kill Vehicle in Midcourse Defense Based on Multi-Sensors Fusion Method. IFAC-PapersOnLine, 2017, 50, 15032-15037.	0.5	3
66	EKF-LQR-based Cooperative Optimal Control of IPMSM. , 2017, , .		0
67	Identification of nonlinear systems with rate saturation. , 2017, , .		0
68	Aerodynamic modeling for hypersonic flight vehicles with account of scramjet effects. , 2017, , .		0
69	Design, modelling and hovering control of a tail-sitter with single thrust-vectored propeller. , 2017, , .		5
70	Improved Boosting Model for Unsteady Nonlinear Aerodynamics based on Computational Intelligence. International Journal of Cognitive Informatics and Natural Intelligence, 2017, 11, 46-59.	0.4	2
71	Optimisation design of medium frequency transformer for the offshore dc grid based on multiâ€objective genetic algorithm. IET Power Electronics, 2017, 10, 2157-2162.	1.5	21
72	Automatic PID tuning via differential evolution for quadrotor UAVs trajectory tracking. , 2016, , .		1

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73	Optimal state estimation for sampled-data systems with randomly sampled and delayed measurements. , 2016, , .		0
74	A weighted hybrid model for unsteady nonlinear aerodynamics. , 2016, , .		2
75	Modification of recursive least squares algorithm for linear time-varying systems. , 2016, , .		0
76	Aircraft longitudinal unsteady aerodynamic modeling using indicial function. , 2016, , .		0
77	A hybrid NDI control method for the high-alpha super-maneuver flight control. , 2016, , .		7
78	Robust constraint backstepping control for high-performance aircraft with account of unsteady aerodynamic effects. Proceedings of the Institution of Mechanical Engineers, Part G: Journal of Aerospace Engineering, 2016, 230, 2484-2503.	0.7	5
79	Hardware design of the PMSM control system based on DSP and CPLD. , 2015, , .		7
80	The application of a driving circuit based on 1ED020I12-FTA in PMSM. , 2015, , .		2
81	Design and implementation of a life test system for the train driver controller. , 2015, , .		0
82	Hover control of a thrust-vectoring aircraft. Science China Information Sciences, 2015, 58, 1-5.	2.7	3
83	Control and communication of a multi-motor system based on LAN. , 2015, , .		2
84	A Novel Linear Permanent-Magnet Vernier Machine With Improved Force Performance. IEEE Transactions on Magnetics, 2015, 51, 1-10.	1.2	22
85	Composite dynamic surface control of hypersonic flight dynamics using neural networks. Science China Information Sciences, 2015, 58, 1-9.	2.7	11
86	Comprehensive Modeling and Analysis of an Unmanned Coaxial Helicopter. , 2015, , .		4
87	Comprehensive kinematic modeling and analysis of a coaxial helicopterâ€™s swashplate mechanism. Proceedings of the Institution of Mechanical Engineers, Part C: Journal of Mechanical Engineering Science, 2015, 229, 1839-1860.	1.1	5
88	Unsteady Aerodynamics Modeling Using SVM and Artificial Neural Network. Lecture Notes in Electrical Engineering, 2015, , 577-585.	0.3	3
89	Integral backstepping based hovering control of an unmanned coaxial helicopter. , 2014, , .		0
90	Coordination control strategy based on characteristic model for 3-bearing swivel duct nozzles. Science China Technological Sciences, 2014, 57, 2347-2356.	2.0	3

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91	On stabilization and disturbance rejection for the inverted pendulum. , 2014, , .		2
92	Structural topology optimization: Extensibility and attainability. Science China Technological Sciences, 2014, 57, 1310-1321.	2.0	10
93	Research on high-reliable dual-redundancy electro-mechanical actuator controller. , 2014, , .		1
94	Frequency-domain identification of a small-scale unmanned helicopter with harmony search algorithm. International Journal of Computer Applications in Technology, 2014, 49, 141.	0.3	1
95	Design of Five-Phase Modular Flux-Switching Permanent-Magnet Machines for High Reliability Applications. IEEE Transactions on Magnetics, 2013, 49, 3941-3944.	1.2	66
96	High-efficiency control strategy of Aeronautical fuel pump motor. , 2013, , .		0
97	Visual Simulation of Ground Effect. , 2013, , .		3
98	Model and longitudinal hover control of a conceptual thrust-vectored unmanned tail-sitter. , 2013, , .		1
99	Frequency Domain Identification of a Small-Scale Helicopter with Least Square Method. , 2013, , .		0
100	Simulation testing method of V/STOL flight control strategy. , 2012, , .		0
101	Filling the GAP between IMA development and safety assessment through safety-. , 2012, , .		1
102	Optimal Packing Configuration Design with Finite-Circle Method. Journal of Intelligent and Robotic Systems: Theory and Applications, 2012, 67, 185-199.	2.0	18
103	Filling the gap between IMA development and safety assessment through safety-driven model-based system engineering. , 2012, , .		2
104	LabVIEW Based Experimental Platform for UAV System Identification. , 2012, , .		1
105	A Modified Harmony Search Algorithm for Optimization Problems. , 2012, , .		4
106	A superelement formulation for the efficient layout design of complex multi-component system. Structural and Multidisciplinary Optimization, 2012, 45, 643-655.	1.7	26
107	Modeling the yaw dynamics of an unmanned helicopter through modes partition method. Science China Technological Sciences, 2012, 55, 182-192.	2.0	5
108	NN adaptive backstepping based aircraft reconfigurable control design. , 2011, , .		0

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109	System identification for helicopter yaw dynamic modelling. , 2011, , .		1
110	Longitudinal controller design for a fighter aircraft using ℒ<inf>1</inf> adaptive backstepping. , 2011, , .		1
111	AADL-based Modeling and TPN-based Verification of Reconfiguration in Integrated Modular Avionics. , 2011, , .		10
112	A new approach to improve safety of reconfiguration in Integrated Modular Avionics. , 2011, , .		9
113	Dynamic Modeling of an Unmanned Helicopter From Flight Test Data. , 2011, , .		2
114	Model identification and control of a small-scale unmanned helicopter. , 2011, , .		1
115	Control allocation for a V/STOL aircraft based on robust fuzzy control. Science China Information Sciences, 2011, 54, 1321-1326.	2.7	9
116	Design and analysis of a new fractional-slot-windings axial-flux permanent-magnet machine. , 2011, , .		2
117	Integrated simulation modeling of transfer alignment with airborne weapon. , 2011, , .		0
118	A modeling module for stereolithography based investment casting resin model. , 2011, , .		1
119	The design for robust controller for hypersonic vehicle based on LPV model. , 2010, , .		1
120	Aeroservoelastic model based active control for large civil aircraft. Science China Technological Sciences, 2010, 53, 1126-1137.	2.0	4
121	Shape optimization of 3D curved slots and its application to the squirrel-cage elastic support design. Science China: Physics, Mechanics and Astronomy, 2010, 53, 1895-1900.	2.0	12
122	Uncertainty modeling and robust flight control of unmanned combat aerial vehicle. , 2010, , .		0
123	Research on evaluation system of user-centered LED garden lamp design. , 2010, , .		0
124	Neural Network Model Predictive Control with Genetic Algorithm Optimization and Its Application to Turbofan Engine Starting. , 2010, , .		0
125	Software Reliability Modeling with Integrated Test Coverage. , 2010, , .		5
126	CI strategy of Chinese enterprises with the core of establishing identity. , 2010, , .		0

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127	Research on autonomous control system structure of UCAV based on cognitive science. , 2009, , .		1
128	Vision System for an Unmanned Helicopter Landing in Complex Environment. , 2009, , .		3
129	Integrated layout design of multiâ€component system. International Journal for Numerical Methods in Engineering, 2009, 78, 631-651.	1.5	117
130	Simultaneous design of components layout and supporting structures using coupled shape and topology optimization technique. Structural and Multidisciplinary Optimization, 2008, 36, 29-41.	1.7	77
131	Fuzzy Mixed Controller Design to an Aircraft. , 2007, , .		0
132	Eigenstructure Assignment Based Flight Control for Advanced Fighter: An Optimization Based Approach. , 2007, , .		7
133	Robust adaptive neural control of a class of nonlinear systems. Tsinghua Science and Technology, 2007, 12, 14-21.	4.1	5
134	Satisfactory control of discrete-time linear periodic systems. Journal of Control Theory and Applications, 2007, 5, 12-16.	0.8	2
135	Adaptive Compensated Dynamic Inversion Control for a Helicopter with Approximate Mathematical Model. , 2006, , .		8
136	Membership Dependable Failure Detectors. , 2006, , .		0
137	The Application of Minimum Entropy H Mixed Sensitivity to Flight Control. , 2006, , .		1
138	Experimental modeling using modified cascade correlation RBF networks for a four DOF tilt rotor aircraft platform. Neurocomputing, 2006, 69, 1802-1805.	3.5	4
139	A Modified SIMPLEX Method Based on Homotopy Continuation Principle and Application to Tiltrotor Airplane. , 2006, , .		0
140	A Novel SINS/GPS Integration Algorithm Based on Neural Networks. , 2006, , .		0
141	Neural Network Adaptive Control for Small Unmanned Tandem Helicopter. , 2006, , .		1
142	Adaptive Neural Control for a Class of MIMO Non-linear Systems with Guaranteed Transient Performance. Lecture Notes in Computer Science, 2006, , 849-858.	1.0	1
143	Input-Output Data Modelling Using Fully Tuned RBF Networks for a Four Degree-of-Freedom Tilt Rotor Aircraft Platform. Lecture Notes in Computer Science, 2005, , 1145-1154.	1.0	1
144	Fault identified for continuous time-variant uncertain system. , 0, , .		0

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145	Pseudo control compensation based neural network dynamic inversion super maneuverable flight control. , 0, , .		2
146	Output tracking of an unmanned tandem helicopter based on dynamic extension method. , 0, , .		2
147	JNS/GPS Integrated System State Estimation Based on Hopfield Neural Network. , 0, , .		1
148	Neural networks direct adaptive control for a class of MIMO uncertain nonlinear systems. , 0, , .		0
149	Nonlinear adaptive internal model control using neural networks for tilt rotor aircraft platform. , 0, , .		2
150	SINS/GPS Integrated System State Estimation Based on Covariance Assignment. , 0, , .		0
151	Soft sensor with deep feature extraction for a sugarcane milling system. Journal of Food Process Engineering, 0, , .	1.5	2