Paulo Moura Oliveira

List of Publications by Citations

92 papers	875 citations	17 h-index	27 g-index
108 ext. papers	1,112 ext. citations	2 avg, IF	4.5 L-index

#	Paper	IF	Citations
92	Particle swarm optimization with fractional-order velocity. *Nonlinear Dynamics*, **2010**, 61, 295-301	5	144
91	Greenhouse air temperature predictive control using the particle swarm optimisation algorithm. *Computers and Electronics in Agriculture*, **2005**, 49, 330-344	6.5	97
90	Manipulator trajectory planning using a MOEA. *Applied Soft Computing Journal*, **2007**, 7, 659-667	7.5	48
89	A multi-objective model for the day-ahead energy resource scheduling of a smart grid with high penetration of sensitive loads. *Applied Energy*, **2016**, 162, 1074-1088	10.7	42
88	A Decision-Support System Based on Particle Swarm Optimization for Multiperiod Hedging in Electricity Markets. *IEEE Transactions on Power Systems*, **2007**, 22, 995-1003	7	37
87	Improving disturbance rejection of PID controllers by means of the magnitude optimum method. *ISA Transactions*, **2010**, 49, 47-56	5.5	33
86	Chaos-based grey wolf optimizer for higher order sliding mode position control of a robotic manipulator. *Nonlinear Dynamics*, **2017**, 90, 1353-1362	5	32
85	Fractional order dynamics in a GA planner. *Signal Processing*, **2003**, 83, 2377-2386	4.4	27
84	Scenario generation for electric vehiclesVuncertain behavior in a smart city environment. *Energy*, **2016**, 111, 664-675	7.9	25
83	From single to many-objective PID controller design using particle swarm optimization. *International Journal of Control, Automation and Systems*, **2017**, 15, 918-932	2.9	24
82	Design of Posicast PID control systems using a gravitational search algorithm. *Neurocomputing*, **2015**, 167, 18-23	5.4	24
81	Grey wolf optimization for PID controller design with prescribed robustness margins. *Soft Computing*, **2016**, 20, 4243-4255	3.5	23
80	Entropy Diversity in Multi-Objective Particle Swarm Optimization. *Entropy*, **2013**, 15, 5475-5491	2.8	22
79	A swarm intelligence-based tuning method for the Sliding Mode Generalized Predictive Control. *ISA Transactions*, **2014**, 53, 1501-15	5.5	20
78	Multi-objective MaxiMin Sorting Scheme. *Lecture Notes in Computer Science*, **2005**, 165-175	0.9	20
77	A long-term risk management tool for electricity markets using swarm intelligence. *Electric Power Systems Research*, **2010**, 80, 380-389	3.5	19
76	Deep Learning Applications in Agriculture: A Short Review. *Advances in Intelligent Systems and Computing*, **2020**, 139-151	0.4	17

75	Dynamical modelling of a genetic algorithm. *Signal Processing*, **2006**, 86, 2760-2770	4.4	15
74	Robot Trajectory Planning Using Multi-objective Genetic Algorithm Optimization. *Lecture Notes in Computer Science*, **2004**, 615-626	0.9	15
73	Visual Trunk Detection Using Transfer Learning and a Deep Learning-Based Coprocessor. *IEEE Access*, **2020**, 8, 77308-77320	3.5	14
72	A feasibility study of sliding mode predictive control for greenhouses. *Optimal Control Applications and Methods*, **2016**, 37, 730-748	1.7	10
71	Multi-objective Genetic Manipulator Trajectory Planner. *Lecture Notes in Computer Science*, **2004**, 219-229	0.9	9
70	Many-objective optimization with corner-based search. *Memetic Computing*, **2015**, 7, 105-118	3.4	8
69	Review of nature and biologically inspired metaheuristics for greenhouse environment control. *Transactions of the Institute of Measurement and Control*, **2020**, 42, 2338-2358	1.8	8
68	An APMonitor Temperature Lab PID Control Experiment for Undergraduate Students **2019**,		8
67	Teaching particle swarm optimization through an open-loop system identification project. *Computer Applications in Engineering Education*, **2014**, 22, 227-237	1.6	8
66	Road Tunnels Lighting using Genetic Algorithms **2009**,		8
65	Many-Objective PSO PID Controller Tuning. *Lecture Notes in Electrical Engineering*, **2015**, 183-192	0.2	7
64	Teaching automation and control with App Inventor applications **2015**,		6
63	Trends in Gravitational Search Algorithm. *Advances in Intelligent Systems and Computing*, **2018**, 270-277	0.4	5
62	Blending Artificial Intelligence into PID Controller Design: A Biomedical Engineering Experiment. *IFAC-PapersOnLine*, **2016**, 49, 366-371	0.7	5
61	A Set of Active Disturbance Rejection Controllers Based on Integrator Plus Dead-Time Models. *Applied Sciences (Switzerland)*, **2021**, 11, 1671	2.6	5
60	PID controller tuning for integrating processes. *IFAC-PapersOnLine*, **2018**, 51, 586-591	0.7	5
59	Robotic grasping: from wrench space heuristics to deep learning policies. *Robotics and Computer-Integrated Manufacturing*, **2021**, 71, 102176	9.2	5
58	Automation and Control in Greenhouses: State-of-the-Art and Future Trends. *Lecture Notes in Electrical Engineering*, **2017**, 597-606	0.2	4

57	Underdamped Second-Order Systems Overshoot Control. *IFAC Postprint Volumes IPPV / International Federation of Automatic Control*, **2012**, 45, 518-523		4
56	Long-term Price Range Forecast Applied to Risk Management Using Regression Models **2007**,		4
55	Multi-Objective Particle Swarm Optimization Design of PID Controllers. *Lecture Notes in Computer Science*, **2009**, 1222-1230	0.9	4
54	MaxiMin MOPSO Design of Parallel Robotic Manipulators. *Advances in Intelligent and Soft Computing*, **2011**, 339-347		4
53	Swarm-Based Design of Proportional Integral and Derivative Controllers Using a Compromise Cost Function: An Arduino Temperature Laboratory Case Study. *Algorithms*, **2020**, 13, 315	1.8	4
52	Mean Arterial Pressure PID Control Using a PSO-BOIDS Algorithm. *Advances in Intelligent Systems and Computing*, **2014**, 91-99	0.4	3
51	Gravitational Search Algorithm Design of Posicast PID Control Systems. *Advances in Intelligent Systems and Computing*, **2013**, 191-199	0.4	3
50	Diffusion of Innovation Simulation Using an Evolutionary Algorithm. *Lecture Notes in Computer Science*, **2013**, 46-63	0.9	3
49	Optimized Fractional Order Sliding Mode Controller for Water Level in Irrigation Canal Pool. *IFAC-PapersOnLine*, **2017**, 50, 7663-7668	0.7	2
48	Dynamic Shannon Performance in a Multiobjective Particle Swarm Optimization. *Entropy*, **2019**, 21, 827	2.8	2
47	Innovating in Control Engineering Teaching/Learning with Smartphones **2019**,		2
46	Gantry crane control: A simulation case study **2013**,		2
45	Grey Wolf, Gravitational Search and Particle Swarm Optimizers: A Comparison for PID Controller Design. *Lecture Notes in Electrical Engineering*, **2017**, 239-249	0.2	2
44	Diversity study of multi-objective genetic algorithm based on Shannon entropy **2014**,		2
43	Fractional dynamics in particle swarm optimization **2007**,		2
42	Nature Inspired Metaheuristics and Their Applications in Agriculture: A Short Review. *Lecture Notes in Computer Science*, **2019**, 167-179	0.9	2
41	Corner Based Many-Objective Optimization. *Studies in Computational Intelligence*, **2014**, 125-139	0.8	2
40	Extended Stability Conditions for CDM Controller Design. *Lecture Notes in Electrical Engineering*, **2015**, 171-182	0.2	2

39	Greenhouse Heat Load Prediction Using a Support Vector Regression Model. *Advances in Intelligent and Soft Computing*, **2010**, 111-117		2
38	Fractional Particle Swarm Optimization **2014**, 47-56		2
37	Breast Cancer Diagnosis using a Neural Network **2019**,		1
36	Evaluation of Hunting-Based Optimizers for a Quadrotor Sliding Mode Flight Controller. *Robotics*, **2020**, 9, 22	2.8	1
35	**2017**,		1
34	Classroom partial flip for feedback control systems: A biomedical engineering experience **2017**,		1
33	Swarm-based auto-tuning of PID posicast control for uncertain systems **2017**,		1
32	Revisiting the Simulated Annealing Algorithm from a Teaching Perspective. *Advances in Intelligent Systems and Computing*, **2017**, 718-727	0.4	1
31	Robust Control of Agroindustrial Drying Process of Grains Based on Sliding Modes and Gravitational Search Algorithm. *Lecture Notes in Electrical Engineering*, **2017**, 629-639	0.2	1
30	APP inventor as a tool to reach students **2015**,		1
29	Diffusion of innovation in organizations: Simulation using evolutionary computation **2012**,		1
28	Multi-apprentice learning for meta-heuristics parameter tuning in a Multi Agent Scheduling System **2012**,		1
27	Optimal Location of the Workpiece in a PKM-Based Machining Robotic Cell1500-1515		1
26	Design of Discrete Non-Linear Two-Degrees-of-Freedom PID Controllers Using Genetic Algorithms **2001**, 320-323		1
25	Bridging Theory to Practice: Feedforward and Cascade Control with TCLab Arduino Kit. *Lecture Notes in Electrical Engineering*, **2021**, 23-32	0.2	1
24	Bridging Classical Control with Nature Inspired Computation Through PID Robust Design. *Advances in Intelligent Systems and Computing*, **2015**, 307-316	0.4	1
23	A Statistical Classifier for Assessing the Level of Stress from the Analysis of Interaction Patterns in a Touch Screen. *Advances in Intelligent Systems and Computing*, **2013**, 257-266	0.4	1
22	Particle Swarm Optimization for Gantry Control: A Teaching Experiment. *Lecture Notes in Computer Science*, **2011**, 196-207	0.9	1

21	ADRC as an Exercise for Modeling and Control Design in the State-Space **2019**,		1
20	Genetic algorithm applied to remove noise in DICOM images. *Journal of Information and Optimization Sciences*, **2019**, 40, 1543-1558	1.1	1
19	PID Posicast Control for Uncertain Oscillatory Systems: A Practical Experiment. *IFAC-PapersOnLine*, **2018**, 51, 416-421	0.7	1
18	The Model-Based Disturbance Rejection with MOMI Tuning Method for PID Controllers. *Lecture Notes in Electrical Engineering*, **2017**, 81-91	0.2	0
17	Entropy Based Grey Wolf Optimizer. *Lecture Notes in Computer Science*, **2020**, 329-337	0.9	0
16	Your Turn to Learn Flipped Classroom in Automation Courses. *Lecture Notes in Electrical Engineering*, **2021**, 668-675	0.2	0
15	Genetic and Ant Colony Algorithms to Solve the Multi-TSP. *Lecture Notes in Computer Science*, **2021**, 324-332	0.9	0
14	Forecasting Students Dropout: A UTAD University Study. *Future Internet*, **2022**, 14, 76	3.3	0
13	Predictive model based architecture for energy biomass supply chains tactical decisions * *This work was supported by the FCT - Fundao para a Ciencia e Tecnologia through the PhD Studentship SFRH/BD/98032/2013, program POPH - Programa Operacional Potencial Humano and FSE - Fundo Social Europeu.. *IFAC-PapersOnLine*, **2017**, 50, 7681-7686	0.7	
12	Stability of multidimensional systems using bio-inspired meta-heuristics. *International Journal of Control*, **2018**, 91, 2646-2656	1.5	
11	Disturbance Rejection Improvement for the Sliding Mode Smith Predictor Based on Bio-inspired Tuning. *Lecture Notes in Electrical Engineering*, **2017**, 45-58	0.2	
10	Control Engineering Learning by Integrating App-Inventor Based Experiments. *Lecture Notes in Electrical Engineering*, **2017**, 845-855	0.2	
9	Sliding Mode Generalized Predictive Control Based on Dual Optimization. *Lecture Notes in Electrical Engineering*, **2015**, 81-90	0.2	
8	Automated design of microwave discrete tuning differential capacitance circuits in Si-integrated technologies. *Microwave and Optical Technology Letters*, **2010**, 52, 629-634	1.2	
7	Optimal Location of the Workpiece in a PKM-based Machining Robotic Cell223-236		
6	Integrating MIT App-Inventor in PLC Programming Teaching. *Lecture Notes in Electrical Engineering*, **2019**, 17-24	0.2	
5	Conflict Resolution Problem Solving with Bio-Inspired Metaheuristics. *Advances in Linguistics and Communication Studies*, **2016**, 168-182	0.3	
4	Design Optimization of Radio Frequency Discrete Tuning Varactors. *Lecture Notes in Computer Science*, **2009**, 343-352	0.9	

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3	Design of Radio-Frequency Integrated CMOS Discrete Tuning Varactors Using the Particle Swarm Optimization Algorithm. *Lecture Notes in Computer Science*, **2009**, 1231-1239	0.9
2	Multi-criteria Manipulator Trajectory Optimization Based on Evolutionary Algorithms. *Advances in Intelligent and Soft Computing*, **2010**, 87-94	
1	Students Drop Out Trends: A University Study. *Communications in Computer and Information Science* , **2021**, 442-450	0.3