Lorenzo Ntogramatzidis

List of Publications by Citations

72 papers	671 citations	14 h-index	22 g-index
108 ext. papers	923 ext. citations	2.9 avg, IF	4.58 L-index

#	Paper	IF	Citations
72	A unified method for the design of nonovershooting linear multivariable state-feedback tracking controllers. *Automatica*, **2010**, 46, 312-321	5.7	49
71	Some new results in the theory of negative imaginary systems with symmetric transfer matrix function. *Automatica*, **2013**, 49, 2138-2144	5.7	48
70	Foundations of Not Necessarily Rational Negative Imaginary Systems Theory: Relations Between Classes of Negative Imaginary and Positive Real Systems. *IEEE Transactions on Automatic Control*, **2016**, 61, 3052-3057	5.9	47
69	Discrete-time negative imaginary systems. *Automatica*, **2017**, 79, 1-10	5.7	37
68	The generalised discrete algebraic Riccati equation in linear-quadratic optimal control. *Automatica*, **2013**, 49, 471-478	5.7	33
67	The design of nonovershooting and nonundershooting multivariable state feedback tracking controllers. *Systems and Control Letters*, **2012**, 61, 714-722	2.4	26
66	A parametrization of the solutions of the finite-horizon LQ problem with general cost and boundary conditions. *Automatica*, **2005**, 41, 1359-1366	5.7	24
65	Explicit reference governor for linear systems. *International Journal of Control*, **2018**, 91, 1415-1430	1.5	23
64	The generalized continuous algebraic Riccati equation and impulse-free continuous-time LQ optimal control. *Automatica*, **2014**, 50, 1176-1180	5.7	18
63	Detectability subspaces and observer synthesis for two-dimensional systems. *Multidimensional Systems and Signal Processing*, **2012**, 23, 79-96	1.8	18
62	A unified method for optimal arbitrary pole placement. *Automatica*, **2014**, 50, 2150-2154	5.7	16
61	On the solution of the Riccati differential equation arising from the LQ optimal control problem. *Systems and Control Letters*, **2010**, 59, 114-121	2.4	15
60	A geometric theory for 2-D systems including notions of stabilisability. *Multidimensional Systems and Signal Processing*, **2008**, 19, 449-475	1.8	15
59	Employing the algebraic Riccati equation for a parametrization of the solutions of the finite-horizon LQ problem: the discrete-time case. *Systems and Control Letters*, **2005**, 54, 693-703	2.4	15
58	Globally Monotonic Tracking Control of Multivariable Systems. *IEEE Transactions on Automatic Control*, **2016**, 61, 2559-2564	5.9	13
57	Robust Eigenstructure Assignment in Geometric Control Theory. *SIAM Journal on Control and Optimization*, **2014**, 52, 960-986	1.9	13
56	LQ optimal control for 2D Roesser models of finite extent. *Systems and Control Letters*, **2009**, 58, 482-490	2.4	13

55	Continuous-time singular linear-quadratic control: Necessary and sufficient conditions for the existence of regular solutions. *Systems and Control Letters*, **2016**, 93, 30-34	2.4	12
54	Multileg Interleaved Buck Converter for EV Charging: Discrete-Time Model and Direct Control Design. *Energies*, **2020**, 13, 466	3.1	11
53	Analytical and graphical design of lead-lag compensators. *International Journal of Control*, **2011**, 84, 1830-1846	1.3	11
52	Linear matrix inequalities for globally monotonic tracking control. *Automatica*, **2015**, 61, 173-177	5.7	10
51	The Extended Symplectic Pencil and the Finite-Horizon LQ Problem With Two-Sided Boundary Conditions. *IEEE Transactions on Automatic Control*, **2013**, 58, 2102-2107	5.9	10
50	A reduction technique for discrete generalized algebraic and difference Riccati equations. *Linear and Multilinear Algebra*, **2014**, 62, 1460-1474	0.7	10
49	Structural Invariants of Two-dimensional Systems. *SIAM Journal on Control and Optimization*, **2012**, 50, 334-356	1.9	10
48	Achieving a nonovershooting transient response with multivariable dynamic output feedback tracking controllers **2009**,		10
47	Self-Bounded Subspaces for Nonstrictly Proper Systems and Their Application to the Disturbance Decoupling With Direct Feedthrough Matrices. *IEEE Transactions on Automatic Control*, **2008**, 53, 423-428	5.9	10
46	A unified approach to finite-horizon generalized LQ optimal control problems for discrete-time systems. *Linear Algebra and Its Applications*, **2007**, 425, 242-260	0.9	10
45	Direct Digital Design of PIDF Controllers with ComPlex Zeros for DC-DC Buck Converters. *Energies*, **2019**, 12, 36	3.1	9
44	Failure identification for 3D linear systems. *Multidimensional Systems and Signal Processing*, **2015**, 26, 481-502	1.8	9
43	On the Partial Realization of Noncausal 2-D Linear Systems. *IEEE Transactions on Circuits and Systems Part 1: Regular Papers*, **2007**, 54, 1800-1808		9
42	Nonovershooting and nonundershooting exact output regulation. *Systems and Control Letters*, **2014**, 70, 30-37	2.4	8
41	A Unified Approach to the Finite-Horizon Linear Quadratic Optimal Control Problem*. *European Journal of Control*, **2007**, 13, 473-488	2.5	8
40	On the reduction of the continuous-time generalized algebraic Riccati equation: An effective procedure for solving the singular LQ problem with smooth solutions. *Automatica*, **2018**, 93, 554-558	5.7	7
39	Direct and exact methods for the synthesis of discrete-time proportional-integral-derivative controllers. *IET Control Theory and Applications*, **2013**, 7, 2164-2171	2.5	7
38	A note on finite-horizon LQ problems with indefinite cost. *Automatica*, **2015**, 52, 290-293	5.7	7

37	A new approach to the cheap LQ regulator exploiting the geometric properties of the Hamiltonian system. *Automatica*, **2008**, 44, 2834-2839	5.7	7
36	The discrete-time generalized algebraic Riccati equation: Order reduction and solutions structure. *Systems and Control Letters*, **2015**, 75, 84-93	2.4	6
35	Tuning and performance assessment of complex fractional-order PI controllers. *IFAC-PapersOnLine*, **2018**, 51, 757-762	0.7	5
34	Nonovershooting state feedback and dynamic output feedback tracking controllers for descriptor systems. *International Journal of Control*, **2018**, 91, 1785-1800	1.5	4
33	On Kalman filtering for 2-D Fornasini-Marchesini models **2009**,		4
32	Repeated eigenstructure assignment for controlled invariant subspaces. *European Journal of Control*, **2015**, 26, 1-11	2.5	3
31	A general approach to the eigenstructure assignment for reachability and stabilizability subspaces. *Systems and Control Letters*, **2017**, 106, 58-67	2.4	3
30	Solvability conditions for the positive real lemma equations in the discrete time. *IET Control Theory and Applications*, **2017**, 11, 2916-2920	2.5	3
29	Robust repeated pole placement **2013**,		3
28	On the definition of negative imaginary system for not necessarily rational symmetric transfer functions **2013**,		3
27	On the design of non-overshooting linear tracking controllers for right-invertible systems **2009**,		3
26	A unified approach to the finite-horizon LQ regulator - Part I: the continuous time **2006**,		3
25	Measurable Signal Decoupling with Dynamic Feedforward Compensation and Unknown-Input Observation for Systems with Direct Feedthrough*. *European Journal of Control*, **2007**, 13, 489-500	2.5	3
24	A parametrization of the solutions of the Hamiltonian system for stabilizable pairs. *International Journal of Control*, **2005**, 78, 530-533	1.5	3
23	On the well-posedness in the solution of the disturbance decoupling by dynamic output feedback with self bounded and self hidden subspaces. *Automatica*, **2019**, 106, 315-326	5.7	2
22	On the computation of the fundamental subspaces for descriptor systems. *International Journal of Control*, **2016**, 89, 1481-1494	1.5	2
21	Arbitrary pole placement by state feedback with minimum gain **2013**,		2
20	Structural invariants of implicit two-dimensional systems **2011**,		2

19	Lead-Lag compensators: Analytical and graphical design on the Nyquist plane **2011**,		2
18	On the Realization of 2-D Linear Systems With Recursively Computable Latent Variable Models. *IEEE Transactions on Circuits and Systems I: Regular Papers*, **2009**, 56, 644-652	3.9	2
17	The geometry of the generalized algebraic Riccati equation and of the singular Hamiltonian system. *Linear and Multilinear Algebra*, **2019**, 67, 158-174	0.7	2
16	A Structural Approach to State-to-Output Decoupling. *SIAM Journal on Control and Optimization*, **2018**, 56, 3816-3847	1.9	2
15	Arbitrary pole placement with the extended Kautsky Nichols Van Dooren parametric form. *International Journal of Control*, **2016**, 89, 1359-1366	1.5	1
14	A Novel Instructional Approach to the Design of Standard Controllers: Using Inversion Formulae. *IEEE Transactions on Education*, **2014**, 57, 54-60	2.1	1
13	Geometric techniques for implicit two-dimensional systems. *Multidimensional Systems and Signal Processing*, **2013**, 24, 601-620	1.8	1
12	On the generalized algebraic Riccati equations * *This work was partially supported by the Australian Research Council (DP160104994).. *IFAC-PapersOnLine*, **2017**, 50, 9555-9560	0.7	1
11	Robust eigenstructure assignment in the computation of friends of output-nulling subspaces **2013**,		1
10	Comments on "Structural Invariant Subspaces of Singular Hamiltonian Systems and Nonrecursive Solutions of Finite-Horizon Optimal Control Problems. *IEEE Transactions on Automatic Control*, **2012**, 57, 270-272	5.9	1
9	A Behavioral Approach to Estimation in the Presence of Disturbances. *IEEE Transactions on Automatic Control*, **2021**, 66, 2795-2801	5.9	1
8	Eigenstructure assignment in linear geometric control. *Automatica*, **2021**, 124, 109363	5.7	1
7	Minimizing control volatility for nonlinear systems with smooth piecewise-quadratic input signals. *Systems and Control Letters*, **2020**, 145, 104797	2.4	0
6	Fixed poles in the disturbance decoupling by dynamic output feedback for systems with direct feedthrough matrices. *Automatica*, **2020**, 121, 109159	5.7	0
5	MIMO tracking control of LTI systems: A geometric approach. *Systems and Control Letters*, **2019**, 126, 8-20	2.4	
4	Geometric structure and properties of linear time invariant multivariable systems in the controller canonical form. *IET Control Theory and Applications*, **2017**, 11, 25-37	2.5	
3	Input decoupling with PD and preview control law for non-strictly proper systems. *International Journal of Control*, **2010**, 83, 1741-1750	1.5	
2	Dual lattices for non-strictly proper systems. *IFAC-PapersOnLine*, **2020**, 53, 4392-4397	0.7	

1   State-Space Estimation Using the Behavioral Approach: A Simple Particular Case. *Lecture Notes in Electrical Engineering*, **2021**, 210-220   0.2