## **Gabor Stepan**

List of Publications by Year in descending order

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CAROD STEDAN

#	Article	IF	CITATIONS
1	Effect of axial force on the stability of milling: Local bifurcations around stable islands. JVC/Journal of Vibration and Control, 2023, 29, 440-452.	2.6	2
2	Slipping–rolling transitions of a body with two contact points. Nonlinear Dynamics, 2022, 107, 1511-1528.	5.2	4
3	Delay-induced bifurcations in collocated position control of an elastic arm. Nonlinear Dynamics, 2022, 107, 1611-1622.	5.2	4
4	Routh reducibility and controllability of unstable mechanical systems. Acta Mechanica, 2022, 233, 905-920.	2.1	3
5	Mechanical characterization of high-speed rubber ball impacts applied for impulse excitation. Materials Today: Proceedings, 2022, , .	1.8	0
6	In-process impulse response of milling to identify stability properties by signal processing. Journal of Sound and Vibration, 2022, 527, 116849.	3.9	8
7	Delayed oscillator model of pressure relief valves with outlet piping. Journal of Sound and Vibration, 2022, 534, 117016.	3.9	6
8	Dynamics of vehicle stability control subjected to feedback delay. European Journal of Mechanics, A/Solids, 2022, 96, 104678.	3.7	6
9	Role of Delayed Feedback in Human Balancing. , 2022, , 3063-3068.		Ο
10	Parametric continuation algorithm for time-delay systems and bifurcation caused by multiple characteristic roots. Nonlinear Dynamics, 2021, 103, 3241-3253.	5.2	10
11	Why is it hard to identify the onset of chatter? A stochastic resonance perspective. CIRP Annals - Manufacturing Technology, 2021, 70, 329-332.	3.6	2
12	Motion control of a two-wheeled inverted pendulum with uncertain rolling resistance and angle constraint based on slow-fast dynamics. Nonlinear Dynamics, 2021, 104, 2185-2199.	5.2	2
13	Nonlinear dynamics of a basketball rolling around the rim. Nonlinear Dynamics, 2021, 104, 3013.	5.2	Ο
14	Response to perturbation during quiet standing resembles delayed state feedback optimized for performance and robustness. Scientific Reports, 2021, 11, 11392.	3.3	9
15	Machining of slender workpieces subjected to time-periodic axial force: stability and chatter suppression. Journal of Sound and Vibration, 2021, 504, 116114.	3.9	11
16	Evaluation of contact force distribution along a curve, based on measured electric potentials. Acta Mechanica, 2021, 232, 853-879.	2.1	3
17	Stability of the Furuta pendulum with delayed digital controller. IFAC-PapersOnLine, 2021, 54, 204-208.	0.9	1
18	The State-space Model of Micro-chaos. International Journal of Mathematical Models and Methods in Applied Sciences, 2021, 15, 184-189.	0.1	0

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19	Stability charts of a delayed model of vehicle towing. IFAC-PapersOnLine, 2021, 54, 64-69.	0.9	5
20	Time delay model of pressure relief valves. IFAC-PapersOnLine, 2021, 54, 47-51.	0.9	3
21	Bifurcations in basic models of delayed force control. Nonlinear Dynamics, 2020, 99, 99-108.	5.2	8
22	Robust stability of milling operations based on pseudospectral approach. International Journal of Machine Tools and Manufacture, 2020, 149, 103516.	13.4	25
23	Nonlinearities of hardware-in-the-loop environment affecting turning process emulation. International Journal of Machine Tools and Manufacture, 2020, 157, 103611.	13.4	9
24	In-Process Monitoring of Changing Dynamics of a Thin-Walled Component During Milling Operation by Ball Shooter Excitation. Journal of Manufacturing and Materials Processing, 2020, 4, 78.	2.2	5
25	On the nonsmooth dynamics of towed wheels. Meccanica, 2020, 55, 2523-2540.	2.0	3
26	Essential chaotic dynamics of chatter in turning processes. Chaos, 2020, 30, 053108.	2.5	2
27	Experimental analysis and numerical modelling of contact damping. Journal of Sound and Vibration, 2020, 484, 115544.	3.9	1
28	Pseudospectral method for assessing stability robustness for linear timeâ€periodic delayed dynamical systems. International Journal for Numerical Methods in Engineering, 2020, 121, 3505-3528.	2.8	10
29	Tuneable clamping table for chatter avoidance in thin-walled part milling. CIRP Annals - Manufacturing Technology, 2020, 69, 313-316.	3.6	20
30	Effects of Varying Dynamics of Flexible Workpieces in Milling Operations. Journal of Manufacturing Science and Engineering, Transactions of the ASME, 2020, 142, .	2.2	11
31	Chatter Stability of Machining Operations. Journal of Manufacturing Science and Engineering, Transactions of the ASME, 2020, 142, .	2.2	65
32	Collocated Position Control of Oscillatory System in Presence of Delay. , 2020, , .		0
33	Vehicle Shimmy Modeling With Pacejka's Magic Formula and the Delayed Tire Model. Journal of Computational and Nonlinear Dynamics, 2020, 15, .	1.2	7
34	Nonsmooth analysis of three-dimensional slipping and rolling in the presence of dry friction. Nonlinear Dynamics, 2019, 97, 1799-1817.	5.2	21
35	Combined effects of sampling and dry friction on position control. Nonlinear Dynamics, 2019, 98, 3001-3007.	5.2	1
36	Experimental observations on unsafe zones in milling processes. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2019, 377, 20180125.	3.4	16

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37	Experimental investigation of dynamic chip formation in orthogonal cutting. International Journal of Machine Tools and Manufacture, 2019, 145, 103429.	13.4	32
38	Bifurcation analysis of wheel shimmy with non-smooth effects and time delay in the tyre–ground contact. Nonlinear Dynamics, 2019, 98, 841-858.	5.2	36
39	Theoretical and experimental study on the nonlinear dynamics of wheel-shimmy. Nonlinear Dynamics, 2019, 98, 2581-2593.	5.2	7
40	Numerical and experimental investigation of contact length during orthogonal cutting. Materials Today: Proceedings, 2019, 12, 329-334.	1.8	4
41	On stability of emulated turning processes in HIL environment. CIRP Annals - Manufacturing Technology, 2019, 68, 405-408.	3.6	15
42	Stochastic semiâ€discretization for linear stochastic delay differential equations. International Journal for Numerical Methods in Engineering, 2019, 119, 879-898.	2.8	17
43	Closed-form estimations of the bistable region in metal cutting via the method of averaging. International Journal of Non-Linear Mechanics, 2019, 112, 49-56.	2.6	11
44	Optimum Selection of Variable Pitch for Chatter Suppression in Face Milling Operations. Materials, 2019, 12, 112.	2.9	20
45	Symmetry breaking in milling dynamics. International Journal of Machine Tools and Manufacture, 2019, 139, 37-59.	13.4	42
46	Optimization of Edge Geometry of Cylindrical Milling Tools to Enhance Dynamic Stability. , 2019, , .		0
47	Bifurcation analysis of nonlinear timeâ€periodic timeâ€delay systems via semidiscretization. International Journal for Numerical Methods in Engineering, 2018, 115, 57-74.	2.8	12
48	Saturation limits the contribution of acceleration feedback to balancing against reaction delay. Journal of the Royal Society Interface, 2018, 15, 20170771.	3.4	25
49	Numerical methods for the stability of time-periodic hybrid time-delay systems with applications. Applied Mathematical Modelling, 2018, 57, 142-162.	4.2	5
50	Numerical and experimental investigation of the applicability of pellet impacts for impulse excitation. International Journal of Impact Engineering, 2018, 115, 19-31.	5.0	9
51	Sliding and Crossing Dynamics in Extended Filippov Systems. SIAM Journal on Applied Dynamical Systems, 2018, 17, 823-858.	1.6	22
52	Shimmy model for electric vehicle with independent suspensions. Proceedings of the Institution of Mechanical Engineers, Part D: Journal of Automobile Engineering, 2018, 232, 330-340.	1.9	15
53	Experimental Fitting of Rotor Models by Using a Special Three-Node Beam Element. Journal of Computational and Nonlinear Dynamics, 2018, 13, .	1.2	1
54	Operational stability prediction in milling based on impact tests. Mechanical Systems and Signal Processing, 2018, 103, 327-339.	8.0	40

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55	On the stability of two-wheeled vehicle balancing passive human subjects. IFAC-PapersOnLine, 2018, 51, 337-342.	0.9	3
56	Quantification of uncertainty in machining operations based on probabilistic and robust approaches. Procedia CIRP, 2018, 77, 82-85.	1.9	6
57	Gaussian noise process as cutting force model for turning. Procedia CIRP, 2018, 77, 94-97.	1.9	5
58	Milling stability for slowly varying parameters. Procedia CIRP, 2018, 77, 110-113.	1.9	11
59	Ball shooting tests for identification of modal parameter variation in rotating main spindles. Procedia CIRP, 2018, 77, 481-484.	1.9	10
60	High-speed camera measurements in the mechanical analysis of machining. Procedia CIRP, 2018, 77, 155-158.	1.9	5
61	On process damping induced by vibration-dependency of cutting direction in milling. Procedia CIRP, 2018, 77, 171-174.	1.9	2
62	Stability of turning process with tool subjected to compression. Procedia CIRP, 2018, 77, 179-182.	1.9	3
63	Stability analysis in milling by taking into account the influence of forced vibrations on the actual tool-workpiece engagement conditions. Procedia CIRP, 2018, 77, 453-456.	1.9	3
64	Laser scanned patterns of machined surfaces. Procedia CIRP, 2018, 77, 355-358.	1.9	5
65	Hardware-in-the-loop experiment of turning. Procedia CIRP, 2018, 77, 675-678.	1.9	4
66	Energy Distribution of a Vehicle Shimmy System with the Delayed Tyre Model. IFAC-PapersOnLine, 2018, 51, 7-12.	0.9	3
67	Experimental investigation of the shear angle variation during orthogonal cutting. Materials Today: Proceedings, 2018, 5, 26495-26500.	1.8	14
68	Experimental Bifurcation Diagram of Furuta Pendulum. , 2018, , .		1
69	Stability of turning processes for periodic chip formation. Advances in Manufacturing, 2018, 6, 345-353.	6.1	7
70	Microchaos in human postural balance: Sensory dead zones and sampled time-delayed feedback. Physical Review E, 2018, 98, 022223.	2.1	18
71	Ultimate capability of variable pitch milling cutters. CIRP Annals - Manufacturing Technology, 2018, 67, 373-376.	3.6	34
72	Hopf bifurcation analysis of scalar implicit neutral delay differential equation. Electronic Journal of Qualitative Theory of Differential Equations, 2018, , 1-9.	0.5	1

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73	Balancing a wheeled inverted pendulum with a single accelerometer in the presence of time delay. JVC/Journal of Vibration and Control, 2017, 23, 604-614.	2.6	33
74	Spectral element method for stability analysis of milling processes with discontinuous time-periodicity. International Journal of Advanced Manufacturing Technology, 2017, 89, 2503-2514.	3.0	19
75	Robust stability analysis of machining operations. International Journal of Advanced Manufacturing Technology, 2017, 88, 45-54.	3.0	22
76	Nonlinear model-based parameter estimation and stability analysis of an aero-pendulum subject to digital delayed control. International Journal of Dynamics and Control, 2017, 5, 629-643.	2.5	17
77	Optimal Detuning of a Parallel Turning System—Theory and Experiments. Journal of Dynamic Systems, Measurement and Control, Transactions of the ASME, 2017, 139, .	1.6	11
78	Nonlinear dynamics of hardware-in-the-loop experiments on stick–slip phenomena. International Journal of Non-Linear Mechanics, 2017, 94, 380-391.	2.6	8
79	Chatter mitigation using the nonlinear tuned vibration absorber. International Journal of Non-Linear Mechanics, 2017, 91, 103-112.	2.6	35
80	Effect of non-proportional damping on the dynamics and stability of multi-cutter turning systems. International Journal of Machine Tools and Manufacture, 2017, 117, 23-30.	13.4	6
81	Chatter avoidance in cutting highly flexible workpieces. CIRP Annals - Manufacturing Technology, 2017, 66, 377-380.	3.6	47
82	Extension of process damping to milling with low radial immersion. International Journal of Advanced Manufacturing Technology, 2017, 89, 2545-2556.	3.0	23
83	Stability of Damped Skateboards Under Human Control. Journal of Computational and Nonlinear Dynamics, 2017, 12, .	1.2	3
84	Algorithm for Robust Stability of Delayed Multi-Degree-of-Freedom Systems. Advances in Delays and Dynamics, 2017, , 141-154.	0.4	1
85	Effect of wavy tool path on the stability properties of milling by the implicit subspace iteration method. International Journal of Advanced Manufacturing Technology, 2017, 91, 1781-1789.	3.0	2
86	Effect of dry friction on vibrations of sampled-data mechatronic systems. Nonlinear Dynamics, 2017, 88, 349-361.	5.2	6
87	Stability Analysis of the Wave Equation with Delayed Boundary Conditions. Procedia IUTAM, 2017, 22, 139-145.	1.2	1
88	Prediction of robust stability boundaries for milling operations with extended multi-frequency solution and structured singular values. Journal of Manufacturing Processes, 2017, 30, 281-289.	5.9	21
89	Robust controller design for turning operations based on measured frequency response functions. IFAC-PapersOnLine, 2017, 50, 7103-7108.	0.9	3
90	Quantization improves stabilization of dynamical systems with delayed feedback. Chaos, 2017, 27, 114306.	2.5	16

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91	Detailed Contact Surface Evaluation Based on Electric Field Potentials. Procedia CIRP, 2017, 62, 323-328.	1.9	Ο
92	The Development of High Speed Virtual Milling Test. , 2017, , .		3
93	Handling Actuator Saturation as Underactuation: Case Study With Acroboter Service Robot. Journal of Computational and Nonlinear Dynamics, 2017, 12, .	1.2	2
94	On the analysis of the double Hopf bifurcation in machining processes via centre manifold reduction. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2017, 473, 20170502.	2.1	20
95	Hardware-in-the-loop Experiments in Presence of Delay. Procedia IUTAM, 2017, 22, 24-30.	1.2	Ο
96	Dynamics of Cutting Near Double Hopf Bifurcation. Procedia IUTAM, 2017, 22, 123-130.	1.2	4
97	Model Establishment and Parameter Analysis on Shimmy of Electric Vehicle with Independent Suspensions. Procedia IUTAM, 2017, 22, 259-266.	1.2	6
98	Structural stability of a light rotating beam under combined loads. Acta Mechanica, 2017, 228, 3735-3740.	2.1	4
99	Effect of delay combinations on stability and Hopf bifurcation of an oscillator with acceleration-derivative feedback. International Journal of Non-Linear Mechanics, 2017, 94, 392-399.	2.6	19
100	Experimental Determination of Dominant Multipliers in Milling Process by Means of Homogeneous Coordinate Transformation. , 2017, , .		2
101	A Theoretical Investigation of the Effect of the Stochasticity in the Material Properties on the Chatter Detection During Turning. , 2017, , .		8
102	Two-Dimensional Finite Element Analysis of Turning Processes. Periodica Polytechnica, Mechanical Engineering, 2017, 61, 44-54.	1.4	24
103	Numerical Stability Test of Linear Time-Delay Systems of Neutral Type. Advances in Delays and Dynamics, 2017, , 77-91.	0.4	8
104	Sliding Dynamics on Codimension-2 Discontinuity Surfaces. Trends in Mathematics, 2017, , 7-12.	0.1	1
105	Surface Error and Stability Chart of Beam-Type Workpiece in Milling Processes. , 2016, , .		2
106	Analytical expressions for chatter analysis in milling operations with one dominant mode. Journal of Sound and Vibration, 2016, 375, 403-421.	3.9	34
107	Delay-dependent stability analysis by using delay-independent integral evaluation. Automatica, 2016, 70, 153-157.	5.0	41
108	Estimation of Safe Chatter-free Technological Parameter Regions for Machining Operations. Procedia CIRP, 2016, 46, 464-467.	1.9	2

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109	Chatter suppression techniques in metal cutting. CIRP Annals - Manufacturing Technology, 2016, 65, 785-808.	3.6	474
110	Design of self-tuneable mass damper for modular fixturing systems. CIRP Annals - Manufacturing Technology, 2016, 65, 389-392.	3.6	32
111	Stabilizing skateboard speed-wobble with reflex delay. Journal of the Royal Society Interface, 2016, 13, 20160345.	3.4	12
112	Robust Stability of Machining Operations in Case of Uncertain Frequency Response Functions. Procedia CIRP, 2016, 46, 151-154.	1.9	3
113	Cumulative Surface Location Error for Milling Processes Based on Tool-tip Frequency Response Function. Procedia CIRP, 2016, 46, 323-326.	1.9	17
114	Improving the stability of multi-cutter turning with detuned dynamics. Machining Science and Technology, 2016, 20, 440-459.	2.5	16
115	Delayed digital position control of a single-DoF system and the nonlinear behavior of the act-and-wait controller. JVC/Journal of Vibration and Control, 2016, 22, 481-495.	2.6	10
116	Exact stability chart of an elastic beam subjected to delayed feedback. Journal of Sound and Vibration, 2016, 367, 219-232.	3.9	27
117	Estimation of the Bistable Zone for Machining Operations for the Case of a Distributed Cutting-Force Model. Journal of Computational and Nonlinear Dynamics, 2016, 11, .	1.2	14
118	On the Nonlinear Kinematic Oscillations of Railway Wheelsets. Journal of Computational and Nonlinear Dynamics, 2016, 11, .	1.2	3
119	Multi-Baker Map as a Model of Digital PD Control. International Journal of Bifurcation and Chaos in Applied Sciences and Engineering, 2016, 26, 1650023.	1.7	11
120	Discontinuity-induced bifurcations of a dual-point contact ball. Nonlinear Dynamics, 2016, 83, 685-702.	5.2	8
121	State-dependent distributed-delay model of orthogonal cutting. Nonlinear Dynamics, 2016, 84, 1147-1156.	5.2	12
122	Extension of the spectral element method for stability analysis of time-periodic delay-differential equations with multiple and distributed delays. Communications in Nonlinear Science and Numerical Simulation, 2016, 35, 177-189.	3.3	24
123	Tyre induced vibrations of the car–trailer system. Journal of Sound and Vibration, 2016, 362, 214-227.	3.9	15
124	Analytical estimations of limit cycle amplitude for delay-differential equations. Electronic Journal of Qualitative Theory of Differential Equations, 2016, , 1-10.	0.5	7
125	Position Control of Rolling Skateboard. IFAC-PapersOnLine, 2015, 48, 286-291.	0.9	1

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127	State-Dependent, Non-Smooth Model of Chatter Vibrations in Turning. , 2015, , .		3
128	The Effect of Non-Symmetric FRF on Machining: A Case Study. , 2015, , .		8
129	Investigating Multiscale Phenomena in Machining: The Effect of Cutting-Force Distribution Along the Tool's Rake Face on Process Stability. , 2015, , .		2
130	Optimization of the Robust Stability Limit for Multi-Cutter Turning Processes. , 2015, , .		2
131	Regenerative delay, parametric forcing and machine tool chatter: A review. IFAC-PapersOnLine, 2015, 48, 322-327.	0.9	24
132	On the bistable zone of milling processes. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2015, 373, 20140409.	3.4	24
133	A collection on â€~Climate dynamics: multiple scales and memory effects'. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2015, 471, 20150097.	2.1	8
134	Experimental validation of appropriate axial immersions for helical mills. International Journal of Advanced Manufacturing Technology, 2015, 84, 1295.	3.0	8
135	Semi-discretization and the time-delayed PDA feedback control of human balance. IFAC-PapersOnLine, 2015, 48, 93-98.	0.9	8
136	Sensitivity of stability charts with respect to modal parameter uncertainties for turning operations. IFAC-PapersOnLine, 2015, 48, 63-68.	0.9	2
137	Semidiscretization for Time-Delayed Neural Balance Control. SIAM Journal on Applied Dynamical Systems, 2015, 14, 1258-1277.	1.6	19
138	Stability analysis of a two-degree-of-freedom mechanical system subject to proportional–derivative digital position control. JVC/Journal of Vibration and Control, 2015, 21, 1539-1555.	2.6	13
139	Kinematic oscillations of railway wheelsets. Multibody System Dynamics, 2015, 34, 259-274.	2.7	17
140	Self-Excited Lateral Vibrations of Rolling Tires. , 2015, , .		0
141	Bifurcation analysis of a two-DoF mechanical system subject to digital position control. Part I: theoretical investigation. Nonlinear Dynamics, 2014, 76, 1781-1796.	5.2	3
142	Delayed control of an elastic beam. International Journal of Dynamics and Control, 2014, 2, 68-76.	2.5	9
143	Cylindrical milling tools: Comparative real case study for process stability. CIRP Annals - Manufacturing Technology, 2014, 63, 385-388.	3.6	48
144	Nonlinear kinematic oscillations of railway wheelsets of general surface geometry. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 303-304.	0.2	3

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145	Dynamics of Drill Bits With Cutting Edges of Varying Parameters. , 2013, , .		0
146	Bifurcation analysis of a two-DoF mechanical system subject to digital position control. Part II. Effects of asymmetry and transition to chaos. Nonlinear Dynamics, 2013, 74, 1223-1241.	5.2	6
147	Improved prediction of stability lobes with extended multi frequency solution. CIRP Annals - Manufacturing Technology, 2013, 62, 411-414.	3.6	84
148	Contact patch memory of tyres leading to lateral vibrations of four-wheeled vehicles. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2013, 371, 20120427.	3.4	23
149	Acceleration feedback improves balancing against reflex delay. Journal of the Royal Society Interface, 2013, 10, 20120763.	3.4	101
150	Nonlinear Bifurcation Analysis of a Single-DoF Model of a Robotic Arm Subject to Digital Position Control. Journal of Computational and Nonlinear Dynamics, 2013, 8, .	1.2	15
151	Efficient Stability Chart Computation for General Delayed Linear Time Periodic Systems. , 2013, , .		1
152	Regenerative Effect of Tire Carcass in Simple Shimmy Models. , 2013, , .		0
153	Stability Properties and Optimization of Multi-Cutter Turning Operations. , 2013, , .		5
154	Redundancy Resolution of the Underactuated Manipulator. CISM International Centre for Mechanical Sciences, Courses and Lectures, 2013, , 233-240.	0.6	2
155	The Effect of Helix Angle Variation on Milling Stability. Journal of Manufacturing Science and Engineering, Transactions of the ASME, 2012, 134, .	2.2	57
156	Micro-shimmy of towed structures in experimentally uncharted unstable parameter domain. Vehicle System Dynamics, 2012, 50, 1613-1630.	3.7	28
157	Subcritical Bifurcations in Shimmy Dynamics. , 2012, , .		0
158	Bisection method in higher dimensions and the efficiency number. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 81.	1.4	71
159	General Milling Stability Model for Cylindrical Tools. Procedia CIRP, 2012, 4, 90-97.	1.9	22
160	Time-optimal computed-torque control in contact transitions. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 43.	1.4	1
161	Stability of an elastic supported flat plate subjected to potential flow. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 99.	1.4	0
162	Analytical investigation of single and double Neimark-Sacker bifurcations. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 13.	1.4	2

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163	Optimization of material removal rate for orthogonal cutting with vibration limits. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 91.	1.4	5
164	Model based reconstruction of milled surface topography from measured cutting forces. International Journal of Machine Tools and Manufacture, 2012, 54-55, 25-33.	13.4	33
165	Case studies for computed torque control of constrained underactuated systems. Periodica Polytechnica, Mechanical Engineering, 2012, 56, 73.	1.4	2
166	Bifurcation Analysis of a Two-DoF System Subject to Digital Position Control. , 2012, , .		0
167	Nonlinear Bifurcation Analysis of a Robotic Arm Subject to Digital Position Control. , 2011, , .		0
168	State Dependent Regenerative Effect in Milling Processes. Journal of Computational and Nonlinear Dynamics, 2011, 6, .	1.2	34
169	The Effect of Harmonic Helix Angle Variation on Milling Stability. , 2011, , .		3
170	Fold Bifurcation in the State-Dependent Delay Model of Milling: Analytical and Numerical Solutions. , 2011, , .		0
171	Identification of cutting force characteristics based on chatter experiments. CIRP Annals - Manufacturing Technology, 2011, 60, 113-116.	3.6	42
172	Computed torque control of an under-actuated service robot platform modeled by natural coordinates. Communications in Nonlinear Science and Numerical Simulation, 2011, 16, 2205-2217.	3.3	23
173	On the global dynamics of chatter in the orthogonal cuttingmodel. International Journal of Non-Linear Mechanics, 2011, 46, 330-338.	2.6	78
174	Sampling and round-off, as sources of chaos in PD-controlled systems. , 2011, , .		4
175	Semi-Discretization for Time-Delay Systems. Applied Mathematical Sciences (Switzerland), 2011, , .	0.8	271
176	The ACROBOTER Platform – Part 1: Conceptual Design and Dynamics Modeling Aspects. IUTAM Symposium on Cellular, Molecular and Tissue Mechanics, 2011, , 3-10.	0.2	0
177	The ACROBOTER Platform - Part 2: Servo-Constraints in Computed Torque Control. IUTAM Symposium on Cellular, Molecular and Tissue Mechanics, 2011, , 11-18.	0.2	0
178	Experimental and Theoretical Study of Distributed Delay in Machining. IFAC Postprint Volumes IPPV / International Federation of Automatic Control, 2010, 43, 109-113.	0.4	1
179	Balancing using accelerometers and equations with advanced arguments. IFAC Postprint Volumes IPPV / International Federation of Automatic Control, 2010, 43, 103-108.	0.4	0
180	Comparison of Time Delayed Tyre Models. IFAC Postprint Volumes IPPV / International Federation of Automatic Control, 2010, 43, 114-119.	0.4	2

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181	The effect of serration on mechanics and stability of milling cutters. International Journal of Machine Tools and Manufacture, 2010, 50, 511-520.	13.4	113
182	Full Characterization of Act-and-wait Control for First-order Unstable Lag Processes. JVC/Journal of Vibration and Control, 2010, 16, 1209-1233.	2.6	24
183	On the dimension reduction of systems with feedback delay by act-and-wait control. IMA Journal of Mathematical Control and Information, 2010, 27, 457-473.	1.7	16
184	DIGITAL CONTROL AS SOURCE OF CHAOTIC BEHAVIOR. International Journal of Bifurcation and Chaos in Applied Sciences and Engineering, 2010, 20, 1365-1378.	1.7	19
185	Feasibility Study of Optical Detection of Chatter Vibration During Milling. International Journal of Optomechatronics, 2010, 4, 195-214.	6.6	8
186	Period Doubling Bifurcation and Center Manifold Reduction in a Time-periodic and Time-delayed Model of Machining. JVC/Journal of Vibration and Control, 2010, 16, 1169-1187.	2.6	17
187	Influence of Control Valve Delay and Dead Zone on the Stability of a Simple Hydraulic Positioning System. Mathematical Problems in Engineering, 2010, 2010, 1-15.	1.1	13
188	Delayed feedback of sampled higher derivatives. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2010, 368, 469-482.	3.4	20
189	Traffic jams: dynamics and control. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2010, 368, 4455-4479.	3.4	302
190	Increasing the Accuracy of Digital Force Control Process Using the Act-and-Wait Concept. IEEE/ASME Transactions on Mechatronics, 2010, 15, 291-298.	5.8	25
191	Act-and-Wait Control Concept for a Force Control Process with Delayed Feedback. , 2009, , 133-142.		1
192	Experiments on Quasiperiodic Wheel Shimmy. Journal of Computational and Nonlinear Dynamics, 2009, 4, .	1.2	27
193	Delay effects in shimmy dynamics of wheels with stretched string-like tyres. European Journal of Mechanics, A/Solids, 2009, 28, 516-525.	3.7	61
194	SURFACE PROPERTIES OF THE MACHINED WORKPIECE FOR HELICAL MILLS. Machining Science and Technology, 2009, 13, 227-245.	2.5	53
195	Exciting traffic jams: Nonlinear phenomena behind traffic jam formation on highways. Physical Review E, 2009, 80, 046205.	2.1	106
196	Delay effects in the human sensory system during balancing. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2009, 367, 1195-1212.	3.4	136
197	Delay effects in brain dynamics. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2009, 367, 1059-1062.	3.4	54
198	Increased Stability of Low-Speed Turning Through a Distributed Force and Continuous Delay Model. Journal of Computational and Nonlinear Dynamics, 2009, 4, .	1.2	24

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199	Stabilizing unstable systems by the act-and-wait concept – Case studies. IFAC Postprint Volumes IPPV / International Federation of Automatic Control, 2009, 42, 213-217.	0.4	0
200	Experiments on the Stability of Digital Force Control of Robots. , 2009, , 191-199.		0
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