

# Kaixiang Peng

## List of Publications by Year in Descending Order

**Source:** <https://exaly.com/author-pdf/1587782/kaixiang-peng-publications-by-year.pdf>

**Version:** 2024-04-27

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

93  
papers

1,631  
citations

21  
h-index

38  
g-index

116  
ext. papers

2,219  
ext. citations

4.3  
avg, IF

5.57  
L-index

#	Paper	IF	Citations
93	Modeling and Monitoring for Laminar Cooling Process of Hot Steel Strip Rolling with TimeSpace Nature. <i>Processes</i> , <b>2022</b> , 10, 589	2.9	
92	Exponentially convergent distributed Nash equilibrium seeking for constrained aggregative games. <i>Autonomous Intelligent Systems</i> , <b>2022</b> , 2, 1		
91	A Practical Root Cause Diagnosis Framework for Quality-Related Faults in Manufacturing Processes With Irregular Sampling Measurements. <i>IEEE Transactions on Instrumentation and Measurement</i> , <b>2022</b> , 71, 1-9	5.2	2
90	Fault detection and quantitative assessment method for process industry based on feature fusion. <i>Measurement: Journal of the International Measurement Confederation</i> , <b>2022</b> , 197, 111267	4.6	0
89	A Novel Fault Detection Method Based on the Extraction of Slow Features for Dynamic Nonstationary Processes. <i>IEEE Transactions on Instrumentation and Measurement</i> , <b>2021</b> , 1-1	5.2	1
88	A new multimode process monitoring method based on a hierarchical Dirichlet processHidden semi-Markov model with application to the hot steel strip mill process. <i>Control Engineering Practice</i> , <b>2021</b> , 110, 104767	3.9	3
87	Sensor and Actuator Fault Diagnosis for Robot Joint Based on Deep CNN. <i>Entropy</i> , <b>2021</b> , 23,	2.8	2
86	A nonlinear full condition process monitoring method for hot rolling process with dynamic characteristic. <i>ISA Transactions</i> , <b>2021</b> , 112, 363-372	5.5	5
85	Local multi-model integrated soft sensor based on just-in-time learning for mechanical properties of hot strip mill process. <i>Journal of Iron and Steel Research International</i> , <b>2021</b> , 28, 830-841	1.2	1
84	Boundary Output Feedback Control for a Flexible Two-Link Manipulator System With High-Gain Observers. <i>IEEE Transactions on Control Systems Technology</i> , <b>2021</b> , 29, 835-840	4.8	10
83	A novel semisupervised classification framework for coupling faults in hot rolling mill process. <i>ISA Transactions</i> , <b>2021</b> , 111, 376-386	5.5	0
82	A Novel Feature-Extraction-Based Process Monitoring Method for Multimode Processes With Common Features and Its Applications to a Rolling Process. <i>IEEE Transactions on Industrial Informatics</i> , <b>2021</b> , 17, 6466-6475	11.9	3
81	A lifecycle operating performance assessment framework for hot strip mill process based on robust kernel canonical variable analysis. <i>Control Engineering Practice</i> , <b>2021</b> , 107, 104698	3.9	1
80	An extensible quality-related fault isolation framework based on dual broad partial least squares with application to the hot rolling process. <i>Expert Systems With Applications</i> , <b>2021</b> , 167, 114166	7.8	1
79	Double-Layer Distributed Monitoring Based on Sequential Correlation Information for Large-Scale Industrial Processes in Dynamic and Static States. <i>IEEE Transactions on Industrial Informatics</i> , <b>2021</b> , 17, 6419-6428	11.9	15
78	Neural Networks-Based Fault Tolerant Control of a Robot via Fast Terminal Sliding Mode. <i>IEEE Transactions on Systems, Man, and Cybernetics: Systems</i> , <b>2021</b> , 51, 4091-4101	7.3	18
77	A Residual Generator-Based Plug and Play Control Scheme Toward Enhancing Power Quality in AC Microgrids. <i>IEEE Transactions on Industrial Electronics</i> , <b>2021</b> , 1-1	8.9	0

76	A recursive model of residual life prediction for human beings with health information from activities of daily living and memory. <i>Systems Science and Control Engineering</i> , <b>2021</b> , 9, 529-541	2	
75	. <i>IEEE Transactions on Control Systems Technology</i> , <b>2021</b> , 1-8	4.8	
74	Remaining Useful Life Prediction for a Roller in a Hot Strip Mill Based on Deep Recurrent Neural Networks. <i>IEEE/CAA Journal of Automatica Sinica</i> , <b>2021</b> , 8, 1345-1354	7	7
73	Nonlinear quality-related fault detection using combined deep variational information bottleneck and variational autoencoder. <i>ISA Transactions</i> , <b>2021</b> , 114, 444-454	5.5	5
72	Robust recursive filtering for uncertain stochastic systems with amplify-and-forward relays. <i>International Journal of Systems Science</i> , <b>2020</b> , 51, 1188-1199	2.3	54
71	Remaining Useful Life Prediction of Lithium-Ion Batteries Based on Conditional Variational Autoencoders-Particle Filter. <i>IEEE Transactions on Instrumentation and Measurement</i> , <b>2020</b> , 69, 8831-8843	5.2	31
70	Nonlinear Fault Detection Based on Fault-related Multiphase Principle Polynomial Analysis for Al Stack Etch Process. <i>IFAC-PapersOnLine</i> , <b>2020</b> , 53, 11860-11865	0.7	
69	A Novel Propagation Path Identification Framework for Faults in Industrial Processes. <i>IFAC-PapersOnLine</i> , <b>2020</b> , 53, 11878-11882	0.7	
68	Multimode Process Monitoring and Fault Diagnosis Based on Tensor Decomposition. <i>IFAC-PapersOnLine</i> , <b>2020</b> , 53, 120-125	0.7	
67	Performance-Based Fault-Tolerant Control Approaches For Industrial Processes With Multiplicative Faults. <i>IEEE Transactions on Industrial Informatics</i> , <b>2020</b> , 16, 4759-4768	11.9	14
66	An incipient fault detection and self-learning identification method based on robust SVDD and RBM-PNN. <i>Journal of Process Control</i> , <b>2020</b> , 85, 173-183	3.9	15
65	Data-driven design of fault-tolerant control systems based on recursive stable image representation. <i>Automatica</i> , <b>2020</b> , 122, 109246	5.7	10
64	Monitoring of Nonlinear Processes With Multiple Operating Modes Through a Novel Gaussian Mixture Variational Autoencoder Model. <i>IEEE Access</i> , <b>2020</b> , 8, 114487-114500	3.5	0
63	Just-in-Time Learning-Based Soft Sensor for Mechanical Properties of Strip Steel via Multi-Block Weighted Semisupervised Models. <i>IEEE Access</i> , <b>2020</b> , 8, 123869-123881	3.5	1
62	A novel industrial process monitoring method based on improved local tangent space alignment algorithm. <i>Neurocomputing</i> , <b>2020</b> , 405, 114-125	5.4	7
61	A novel common and specific features extraction-based process monitoring approach with application to a hot rolling mill process. <i>Control Engineering Practice</i> , <b>2020</b> , 104, 104628	3.9	1
60	A novel key performance indicator oriented hierarchical monitoring and propagation path identification framework for complex industrial processes. <i>ISA Transactions</i> , <b>2020</b> , 96, 1-13	5.5	5
59	. <i>IEEE Transactions on Industrial Electronics</i> , <b>2020</b> , 67, 1316-1327	8.9	21

58	. <i>IEEE Transactions on Industrial Informatics</i> , <b>2020</b> , 16, 2946-2955	11.9	4
57	A Correlation-Based Distributed Fault Detection Method and Its Application to a Hot Tandem Rolling Mill Process. <i>IEEE Transactions on Industrial Electronics</i> , <b>2020</b> , 67, 2380-2390	8.9	13
56	A deep belief network based health indicator construction and remaining useful life prediction using improved particle filter. <i>Neurocomputing</i> , <b>2019</b> , 361, 19-28	5.4	46
55	Quality Monitoring and Root Cause Diagnosis for Industrial Processes Based on Lasso-SAE-CCA. <i>IEEE Access</i> , <b>2019</b> , 7, 90230-90242	3.5	3
54	A novel plant-wide process monitoring framework based on distributed Gap-SVDD with adaptive radius. <i>Neurocomputing</i> , <b>2019</b> , 350, 1-12	5.4	4
53	A New Hierarchical Framework for Detection and Isolation of Multiple Faults in Complex Industrial Processes. <i>IEEE Access</i> , <b>2019</b> , 7, 12006-12015	3.5	5
52	Fuzzy Fault Detection Filter Design for Nonlinear Distributed Parameter Systems. <i>IEEE Access</i> , <b>2019</b> , 7, 11105-11113	3.5	8
51	. <i>IEEE Transactions on Industrial Informatics</i> , <b>2019</b> , 15, 2091-2100	11.9	24
50	Routh table test for stability of commensurate fractional degree polynomials and their commensurate fractional order systems. <i>Control Theory and Technology</i> , <b>2019</b> , 17, 297-306	1	1
49	Integration of fault diagnosis and control based on residual decoupling. <i>Systems Science and Control Engineering</i> , <b>2019</b> , 7, 210-221	2	1
48	A Health Indicator Construction Method based on Deep Belief Network for Remaining Useful Life Prediction <b>2019</b> ,		1
47	Distributed Optimization Over Unbalanced Graph: Integration of Surplus-Based Method and Push-DIGing Method <b>2019</b> ,		1
46	Remaining Useful Life Prediction for Aircraft Engines Based on Grey Model <b>2019</b> ,		2
45	Performance-based fault detection and fault-tolerant control for automatic control systems. <i>Automatica</i> , <b>2019</b> , 99, 308-316	5.7	63
44	Implementing multivariate statistics-based process monitoring: A comparison of basic data modeling approaches. <i>Neurocomputing</i> , <b>2018</b> , 290, 172-184	5.4	16
43	Root cause diagnosis of quality-related faults in industrial multimode processes using robust Gaussian mixture model and transfer entropy. <i>Neurocomputing</i> , <b>2018</b> , 285, 60-73	5.4	24
42	Adaptive Neural Control for Robotic Manipulators With Output Constraints and Uncertainties. <i>IEEE Transactions on Neural Networks and Learning Systems</i> , <b>2018</b> , 29, 5554-5564	10.3	159
41	A Common and Individual Feature Extraction-Based Multimode Process Monitoring Method With Application to the Finishing Mill Process. <i>IEEE Transactions on Industrial Informatics</i> , <b>2018</b> , 14, 4841-4850	11.9	31

40	Data-Driven Quality Monitoring Techniques for Distributed Parameter Systems With Application to Hot-Rolled Strip Laminar Cooling Process. <i>IEEE Access</i> , <b>2018</b> , 6, 16646-16654	3.5	9
39	A data-driven fault detection approach with performance optimization. <i>Canadian Journal of Chemical Engineering</i> , <b>2018</b> , 96, 507-514	2.3	7
38	A Fault Detection Approach for Nonlinear Systems Based on Data-Driven Realizations of Fuzzy Kernel Representations. <i>IEEE Transactions on Fuzzy Systems</i> , <b>2018</b> , 26, 1800-1812	8.3	23
37	Fault detection for piecewise affine systems with application to ship propulsion systems. <i>ISA Transactions</i> , <b>2018</b> , 78, 3-9	5.5	5
36	. <i>IEEE Access</i> , <b>2018</b> , 6, 43808-43823	3.5	2
35	A practical propagation path identification scheme for quality-related faults based on nonlinear dynamic latent variable model and partitioned Bayesian network. <i>Journal of the Franklin Institute</i> , <b>2018</b> , 355, 7570-7594	4	10
34	Modelling the strip thickness in hot steel rolling mills using least-squares support vector machines. <i>Canadian Journal of Chemical Engineering</i> , <b>2018</b> , 96, 171-178	2.3	18
33	Recursive Subspace-based Predictive Control and Its Application to Fault-tolerant Control. <i>IFAC-PapersOnLine</i> , <b>2018</b> , 51, 696-702	0.7	3
32	A Deep Belief Network-based Fault Detection Method for Nonlinear Processes. <i>IFAC-PapersOnLine</i> , <b>2018</b> , 51, 9-14	0.7	14
31	An output probabilistic constrained control algorithm based on adaptive dynamic matrix control <b>2018</b> ,		1
30	Time-Varying Fault Diagnosis for Asynchronous Multisensor Systems Based on Augmented IMM and Strong Tracking Filtering. <i>Journal of Control Science and Engineering</i> , <b>2018</b> , 2018, 1-8	1.2	4
29	A novel dynamic non-Gaussian approach for quality-related fault diagnosis with application to the hot strip mill process. <i>Journal of the Franklin Institute</i> , <b>2017</b> , 354, 702-721	4	21
28	Event-triggered fault detection framework based on subspace identification method for the networked control systems. <i>Neurocomputing</i> , <b>2017</b> , 239, 257-267	5.4	11
27	A KPI-based process monitoring and fault detection framework for large-scale processes. <i>ISA Transactions</i> , <b>2017</b> , 68, 276-286	5.5	24
26	An Efficient Quality-Related Fault Diagnosis Method for Real-Time Multimode Industrial Process. <i>Journal of Control Science and Engineering</i> , <b>2017</b> , 2017, 1-13	1.2	2
25	A novel data-based quality-related fault diagnosis scheme for fault detection and root cause diagnosis with application to hot strip mill process. <i>Control Engineering Practice</i> , <b>2017</b> , 67, 43-51	3.9	32
24	Assessment of T2- and Q-statistics for detecting additive and multiplicative faults in multivariate statistical process monitoring. <i>Journal of the Franklin Institute</i> , <b>2017</b> , 354, 668-688	4	15
23	Using the expected detection delay to assess the performance of different multivariate statistical process monitoring methods for multiplicative and drift faults. <i>ISA Transactions</i> , <b>2017</b> , 67, 56-66	5.5	13

22	Joint Data-Driven Fault Diagnosis Integrating Causality Graph With Statistical Process Monitoring for Complex Industrial Processes. <i>IEEE Access</i> , <b>2017</b> , 5, 25217-25225	3.5	13
21	Wide Area Coordinated Control of Multi-FACTS Devices to Damp Power System Oscillations. <i>Energies</i> , <b>2017</b> , 10, 2130	3.1	2
20	Remaining Useful Life Estimation Based on Asynchronous Multisource Monitoring Information Fusion. <i>Journal of Control Science and Engineering</i> , <b>2017</b> , 2017, 1-8	1.2	0
19	Quality-related process monitoring for dynamic non-Gaussian batch process with multi-phase using a new data-driven method. <i>Neurocomputing</i> , <b>2016</b> , 214, 317-328	5.4	18
18	Online Monitoring System Design for Roll Eccentricity in Rolling Mills. <i>IEEE Transactions on Industrial Electronics</i> , <b>2016</b> , 63, 2559-2568	8.9	15
17	Quality-related fault detection using linear and nonlinear principal component regression. <i>Journal of the Franklin Institute</i> , <b>2016</b> , 353, 2159-2177	4	56
16	Quality-relevant fault monitoring based on efficient projection to latent structures with application to hot strip mill process. <i>IET Control Theory and Applications</i> , <b>2015</b> , 9, 1135-1145	2.5	24
15	A comparison and evaluation of key performance indicator-based multivariate statistics process monitoring approaches. <i>Journal of Process Control</i> , <b>2015</b> , 33, 112-126	3.9	129
14	Unit-level modelling for KPI of batch hot strip mill process using dynamic partial least squares. <i>IFAC-PapersOnLine</i> , <b>2015</b> , 48, 1005-1010	0.7	2
13	Quality-related prediction and monitoring of multi-mode processes using multiple PLS with application to an industrial hot strip mill. <i>Neurocomputing</i> , <b>2015</b> , 168, 1094-1103	5.4	39
12	Quality-relevant fault detection and diagnosis for hot strip mill process with multi-specification and multi-batch measurements. <i>Journal of the Franklin Institute</i> , <b>2015</b> , 352, 987-1006	4	44
11	Adaptive total PLS based quality-relevant process monitoring with application to the Tennessee Eastman process. <i>Neurocomputing</i> , <b>2015</b> , 154, 77-85	5.4	60
10	Strip shape modeling and its setup strategy in hot strip mill process. <i>International Journal of Advanced Manufacturing Technology</i> , <b>2014</b> , 72, 589-605	3.2	22
9	A new data-driven process monitoring scheme for key performance indicators with application to hot strip mill process. <i>Journal of the Franklin Institute</i> , <b>2014</b> , 351, 4555-4569	4	10
8	New kernel independent and principal components analysis-based process monitoring approach with application to hot strip mill process. <i>IET Control Theory and Applications</i> , <b>2014</b> , 8, 1723-1731	2.5	19
7	Online Contribution Rate Based Fault Diagnosis for Nonlinear Industrial Processes. <i>Zidonghua Xuebao/Acta Automatica Sinica</i> , <b>2014</b> , 40, 423-430		11
6	Contribution rate plot for nonlinear quality-related fault diagnosis with application to the hot strip mill process. <i>Control Engineering Practice</i> , <b>2013</b> , 21, 360-369	3.9	76
5	A Novel Scheme for Key Performance Indicator Prediction and Diagnosis With Application to an Industrial Hot Strip Mill. <i>IEEE Transactions on Industrial Informatics</i> , <b>2013</b> , 9, 2239-2247	11.9	171

4	Robust Backstepping Control for Cold Rolling Main Drive System with Nonlinear Uncertainties. <i>Abstract and Applied Analysis</i> , <b>2013</b> , 2013, 1-7	0.7	6
3	Quality-Related Process Monitoring Based on Total Kernel PLS Model and Its Industrial Application. <i>Mathematical Problems in Engineering</i> , <b>2013</b> , 2013, 1-14	1.1	52
2	Intermittent Fault Detection for Uncertain Networked Systems. <i>Mathematical Problems in Engineering</i> , <b>2013</b> , 2013, 1-10	1.1	3
1	Vector control of induction motor based on online identification and ant colony optimization <b>2010</b> ,		2