

2018 IEEE 3rd Advanced Information Technology, Electronic and Automation Control Conference (IAEAC 2018)

**Chongqing, China
12-14 October 2018**

Pages 1-652



**IEEE Catalog Number: CFP18IAK-POD
ISBN: 978-1-5386-4510-9**

**Copyright © 2018 by the Institute of Electrical and Electronics Engineers, Inc.
All Rights Reserved**

Copyright and Reprint Permissions: Abstracting is permitted with credit to the source. Libraries are permitted to photocopy beyond the limit of U.S. copyright law for private use of patrons those articles in this volume that carry a code at the bottom of the first page, provided the per-copy fee indicated in the code is paid through Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923.

For other copying, reprint or republication permission, write to IEEE Copyrights Manager, IEEE Service Center, 445 Hoes Lane, Piscataway, NJ 08854. All rights reserved.

****** This is a print representation of what appears in the IEEE Digital Library. Some format issues inherent in the e-media version may also appear in this print version.***

IEEE Catalog Number:	CFP18IAK-POD
ISBN (Print-On-Demand):	978-1-5386-4510-9
ISBN (Online):	978-1-5386-4509-3
ISSN:	2381-0947

Additional Copies of This Publication Are Available From:

Curran Associates, Inc
57 Morehouse Lane
Red Hook, NY 12571 USA
Phone: (845) 758-0400
Fax: (845) 758-2633
E-mail: curran@proceedings.com
Web: www.proceedings.com

CURRAN ASSOCIATES INC.
proceedings
.com

Table of Contents

5	Estimation of primitive polynomial form - sequence with finite sequence length <i>Weixuan Jin, Jie Wang, Hongshu Liao, Lu Gan</i>	1
6	Research on the Key Technologies of 3D GIS for Wisdom Forest Platform <i>Shan Yue</i>	5
9	Design of USBTMC driver based on Program-controlled Vector Network Analyzer <i>Cai Hongkun, Li Shubiao</i>	9
12	The Research of Dynamic Spectrum Allocation Based on Game Theory <i>Peijun Li, Dongdong Liu</i>	14
13	Review of Non-intrusive Load Appliance Monitoring <i>Wang Dan , Huang Xiao Li , YeShu Ce</i>	18
14	Bus Voltage Deviation Automatic Compensation Control Based On Droop Control <i>Qi Liu, Zhouxing Fu</i>	24
15	Design of An Airborne Multi-frequency D-InSAR System <i>Jieqiong Zhang, Yongqiang Deng</i>	29
16	An improved wolf pack algorithm for sustainable machining parameter optimization <i>Dongsheng Zhao, Xiaoxia Li, Jie Yang</i>	34
19	Dual-band Band-stop Filter Design Based on Single Defected Microstrip Structure <i>Dong-Sheng La, Jun Xu, Jingwei Guo, Bu-Ying Zhang, Shou-Qing Jia</i>	39
22	Power System Cleanliness Evaluation Based on Weighted Entropy and Fuzzy Theory <i>Xiran Wang, Cong Lai , Dan Yu , Youyou Cai, Chen Li</i>	43
23	Credit Risk Management and Evaluation of Large User Transaction in Electricity Market <i>Xiran Wang , Cong Lai , Dan Yu , Youyou Cai, Chen Li</i>	49
25	Power Factor Control Using Boost Type Converter <i>Asad Ullah, Shahbaz Khan, Ma Hongwei</i>	54
26	Research on Undesirable text Recognition based on Combination kernel function <i>Su Yuting, Song Ziwen</i>	61
28	A Reactive Optimization Model with Flexible Objectives for Power Systems Containing Infeasible Voltage-Violated Buses <i>Chao Lei, Yong Li, Yu Su, Qianggang Wang, Niancheng Zhou</i>	65

32	An Improved Watermarking Algorithm Robust to Camcorder Recording Based on DT-CWT <i>Pei Liu ,Daoshun Wang ,Shundong Li, Xianghui Zhao</i>	71
33	Design of median filtering system based on FPGA for large windows <i>Kang Yang ,Min Wei ,Lei Sun</i>	78
34	Design of High Precision Capacitance Displacement Sensor <i>Yanqing Wu, Tao Huang</i>	83
35	A Dependence-First Clustering Based Partitioning Algorithm for Coarse-Grained Reconfigurable Cipher Logic Array <i>Min Liu , Yinjian Yan , Wei Li, Yiran Du, Yuanming Li</i>	88
37	Combined Operation System of SVG and APF Parallel Bus under Unbalanced Grid <i>Ziyi Fu, Yanjie Dong</i>	93
38	Optimization of APF Single Hysteresis SVPWM Current Tracking Control Strategy <i>Jun Tong, Jianwei Qiao, Lijun Liu, Chenyue Fan, Xiang Li, Facheng Li</i>	98
39	Analysis and Comparison of Array Gain and Directivity Index <i>Bo Yang, Wu Qu, Kaiming Wu, Pengtao Hu, and Cheng Peng</i>	103
40	Research on Fault Diagnosis of Ship Power System Based on Improved Particle Swarm Optimization Neural Network Algorithm <i>Ming Yang , Weifeng Shi</i>	108
42	A Resource Allocation Algorithm based on DILA for D2D communication in LTE-A Multi-cell Network <i>Junshe Wang ,Songhua Wang</i>	114
43	Research on the Method of Remote Reproduction of UTC(NTSC) and its Realization <i>Ruiqiong Chen ,Ya Liu ,Ying Yang,Xiaohui Li</i>	118
44	Research on Six Degrees of Freedom Magnetic Positioning Method based on Homotopy Algorithm <i>Jing Xue, Jianhui Zhao ,Fan Li</i>	123
46	A Decision-Level Fusion Method Based on Convolutional Neural Networks for Remote Sensing Scene Classification <i>Bitao Jiang , Xiaobin Li , Tong Sun , Shengjin Wang</i>	128
47	The Study Of Pedestrian Re-identification With The Illumination Change <i>Chunfang Zhao, Xianqiao Chen</i>	133
48	Prediction of bottom-hole flow pressure in coalbed gas wells based on GA optimization SVM	138

Huang Xiangdong , Wang Shaoqing

- 49 **An Independent Task Scheduling Algorithm in Heterogeneous Multi-core Processor Environment** 142
Lindong Liu , Deyu Qi
- 50 **A Heuristic Algorithm for Satellite Transmission Scheduling Problem** 147
Yanjie Song, Xin Ma, Bingyu Song, Feng Yao, Yingwu Chen
- 51 **Research and Design of Subway BAS Intrusion Detection Expert System** 152
Jianguo Yu, Pei Tian, Haonan Feng, Yan Xiao
- 55 **Research on the Optimization Algorithm of Urban Road Recognition System based on DM6437** 157
Libiao Jiang ,Jingxuan Li , Zhihui Jiang , Jingyuan Zhang
- 56 **Path and Transport Mode Selection in Multimodal Transportation with Time Window** 162
Haiyan Luo, Ju Yang, Xi Nan
- 57 **Research on Integrity Monitoring Method of Time-Frequency Signal** 167
Yuwei Li , Yanrong Xue ,Ruiqiong Chen ,Ya Liu
- 58 **Multi-Agent Based Inter-Objects' Dynamic Relation Discovery and Service Recommendation in Interior Space** 172
Jingmin An , Guanyu Li
- 59 **Research on the Relation between the Number of Measurements and Signal Sparsity in Compressed Sensing** 178
Qi-Fan Yang, Ke Fang , Yong-Jun Xie
- 60 **The Empirical Study on the Film's Network Exposure Effectiveness based on Several DEA Models** 183
Zhuying Huang, Bo Li, Jianping Chai , Xi Feng
- 61 **Comparison between Conformal Cambered and Rectangular Dielectric Resonator Antennas** 188
Wenzhe Liu ,Boyuan Ma ,J. Pan
- 62 **Design and Application of Large Passenger Flow Warning System for Urban Rail Transit** 192
Wei Li , Liying Sui
- 64 **The Rapid and Coordinated Charging Strategy for Private Electric Vehicles** 196
Hengjie Li, Lihua Wen, Wei Chen, Xu Gong, Xianqiang Zeng
- 65 **A Novel Analysis Scheme for Static Voltage Stability of Distribution Network with DFIG and SVC** 201
Qian Zhang, Huanming Liu, Yang Bai, Jinhao Wang, Ying Qu

66	Research on 12-pulse phase controlled rectifier for nuclear power generating stations <i>Qiang YIN ,Jiang-hua GAN ,Yue YU ,Ze-cheng XIONG ,Hao PANG ,Qi-liang ZHAO</i>	207
67	Investigation on Arc Dielectric Resonator Antenna and Arc Microstrip Patch Antenna <i>Wenzhe Liu ,Boyuan Ma,J. Pan</i>	211
70	Design and Realization of a New Digital Hydraulic Transformer <i>Bin LI, Lulu ZHANG, Luyao QUAN, Tong JIANG</i>	215
71	Turn-to-Turn Short Circuit of Motor Stator Fault Diagnosis Using Dropout Rate Improved Deep Sparse AutoEncoder <i>Botao Wang, Baohui Ma, Kexing Xu, Tingting Zheng</i>	220
72	Research on Multi Parameter Logic Threshold Drive Control Strategy for Distributed Hybrid Electric Vehicle <i>Cheng Li, Zhongwen Zhu, Qing Wei, Jinfeng Gong, Xu Wang, Denggao Huang</i>	226
73	Shipborne Radar Servo Control based on Neural Sliding Mode Variable Structure <i>Haiyu Ji ,Zhijian Li ,Keda Pan,Zongjun Zhang</i>	231
74	Strong robust zero watermarking algorithm based on NSCT transform and image normalization <i>Kunyu YANG,Weiwei WANG,Zhihua YUAN,Wenqiang Zhao</i>	236
75	Simulation Study of Double Closed-loop SPWM Inverter Based on Fuzzy Neural Network <i>Zhenxing Liu, Guirong Fei, Zhen Chen</i>	241
76	Calculation of the Electromagnetic Pulse Effect Based on Integral Equation Equivalent Circuit and Electromagnetic Topology <i>Fulin Li ,Jihong Han ,Chang Zhang</i>	246
77	Wide-Beam Conformal Dielectric Resonator Antenna <i>Wenzhe Liu ,Boyuan Ma ,J. Pan</i>	251
78	Analysis of Fractal Dimensions against Noise Interference <i>Weiqliang Liu ,Jinzhe Xie ,Jiulong Xiong and Ying Li</i>	255
79	Kinematics Analysis for a Heavy-load Redundant Manipulator Arm Based on Gradient Projection Method <i>Jian Li, Yixiang Liu, Xizhe Zang</i>	260
80	Design and Realization of the intelligent detector of electrical apparatus <i>GuoQin Zhang</i>	265

81	A New Method of Adaptive Current Protection for Distribution Lines With Wind Turbines <i>Jianwen Zhao , Rui Bian</i>	269
82	A novel grid-based bidirectional local search algorithm for many-objective optimization <i>Qi Bing Jin , Yun Tao Li , Wu Cai</i>	274
83	Fast mileage deviation correction method for track dynamic inspection system based on data fusion technology <i>Hangyuan Qin , Weidong Wang , Jinzhao Liu , Shanchao Sun , Maoxuan Zhang</i>	280
85	State Estimation of Innovation Graph for PMU Power Grid Observation System <i>Suquan Zhou , Zhuangzhuang Li , Haibin Xu</i>	287
86	Application of Wavelet Transform in Differential Absorption Spectrum Data Analysis <i>Guihong Jia , Jianjun Zhang</i>	292
88	Method for Comparative Analysis of Bullet Marks based on the Multi-dimensional Feature Extraction <i>Fengjiao Gao , Xindi Li , Changjiang Song , Gang Wu</i>	297
89	Research on Method of Driver Distraction State Based on Mouth State <i>Xiangdong Huang , Boya Zhang</i>	301
90	Efficient path planning for unmanned aerial vehicle with refuelling stations <i>Mbyayingabo Jean Marie Vianney , Longjiang Li , Uwizeye Erneste</i>	305
92	A Cylindricity Error Evaluation Algorithm Based on Mechanical Thinking <i>Jianlin Wu , Youyi Gu , Chenyang Li , Ancheng Wang , Lixing Jiang</i>	310
93	Research on Relative Supporting Height Estimation of Complex Mobile Roof Support Machinery Based on Multi-sensor Kalman Fusion <i>Lin Zhang , Xuliang Lu , Shang Feng</i>	314
94	A Strategy of Multipath Mitigation Based on Modified Double-Delta Phase Discriminator and TK <i>Miaomiao Chen , Guoliang Sun</i>	321
96	An Overview of Microgrid Planning and Design Method <i>Zhang Guoping , Wang Weijun , Mao Longbo</i>	326
97	Applying Spoof Surface Plasmons to Non-destructive Testing <i>Zipeng Xie , Liguang Sun , Fang Wu , Yongjie Li , Rui Cao</i>	330
98	Research on Application of Smart Phone and Vehicle Positioning Analysis Model Based on SNN Density ST-OPTICS Algorithm in HOV Lanes <i>Yunxiang Liu , Bin Chen , Wei Shi</i>	334

99	Research on Hybrid Access Control Strategy for Smart Campus Platform <i>Bo Liu ,Yongqi Yang,Zhonwen Zhou</i>	342
100	Design of Ultra-wideband High Isolation and Low Insertion Loss SPDT Switch <i>Yubin Yang , Qinglong Zhan</i>	347
101	24 GHz Dielectric Resonator Antenna for MMW Automotive Radar <i>Wenzhe Liu , Boyuan Ma, J. Pan</i>	351
102	A New Design of the Near Zero Refractive Index Metamaterials Loaded with the Radome <i>Yongqiang Deng ,Jieqiong Zhang</i>	355
103	Radar emitter identification based on EPSD-DFN <i>Qiu Jin ,Hongyan Wang , Kaizhi Yang</i>	360
104	Research and Design of Pipeline Register Structure Based on Coarse-grained Reconfigurable Array <i>Yiran Du, Wei Li, Zibin Dai, Longmei Nan</i>	364
106	Navigation and Control System of Mobile Robot Based on ROS <i>Li Zhi , Mei Xuesong</i>	368
107	Dynamic observer design for a class of nonlinear systems <i>Nan Gao, Mohamed Darouach, Marouane Alma</i>	373
108	Design of Bidirectional Fast Charging Movable Power Source <i>Xin Wang ,Xuejiao Luo,Qi Shen</i>	377
109	A Heterogeneous Network Access Selection Algorithm Based on Improved CRITIC <i>Dong Liu ,Damin Zhang ,Juanmin Chen , Zhiyuan Pan</i>	381
110	The Coordinate System Design and Implementation of the Spacecraft's Attitude Simulation based on Five Axis Turntable <i>Chao Li, Ye Yan, Yueneng Yang</i>	388
111	Research and Implementation of Financial Approval System Based on jBPM Engine <i>Hui Jiang</i>	394
112	The Adaptive Vortex Search Algorithm of Optimal Path Planning for Forest Fire Rescue UAV <i>Chunying Wang, Ping Liu, Tongxun Zhang, Jinju Sun</i>	400
113	Foreground Dectection of Yaks of Deep Color Based on Gray Images <i>Zijie Sun, Xiaofeng Qin, Meiyun Du, Yu-an Zhang, Weiru Song, Rende Song</i>	404
114	Disturbance Observer-Based Sliding Mode Control for DC-DC Boost Converter <i>Rangrang Wang, Lei Mei, Guangming Zhang</i>	409

115	Design of Intelligent Monitoring System for Aquaculture Water Dissolved Oxygen <i>Yinchi Ma, Wen Ding</i>	414
118	The Path Modeling and Evaluation Analysis of Jamming <i>Xu Peng, Zhenhua Wang, Xiaoyan Wang</i>	419
120	Defect Detection of PM Fibers Based on SVM <i>Guang Chen , Zhen Yang , Peng Wu</i>	425
122	Auditory Space Perception Influenced by Visual Spatial Information <i>Yujing Chao, Zhijun Zhao, Chang Liu, Lingyun Xie</i>	431
123	Evaluation Method for Multi-Operator and Multi-Robot Teleoperation Systems <i>Guanhua Feng, Wenhao Li, Heng Zhang</i>	436
124	Stereo Matching Algorithm Based on Joint Matching Cost and Adaptive Window <i>Yu Chai, Xiaojing Cao</i>	442
126	Economical Optimal Operation of Multi-energy System Considering Uncertainty <i>Rui Zhu , Jianyong Zheng , Fei Mei , Yi Pan, Cheng Zhou</i>	447
127	Frequency Measurement by FFT Based on FPGA <i>Tao Tang , Jin Pan , Deqiang Yang , Enhao Wang</i>	453
128	Multi-dimensional Taylor Network Optimal Control in Plane Symmetrical Cruise Missile Flight for Attacking Static Targets <i>Jing-Ying Shi, Hong-Sen Yan, Xi-Peng Liu</i>	457
129	A VCP-based Congestion Control Algorithm in Named Data Networking <i>Sisi Xing, Baoqun Yin, Jinfa Yao, Heng Zhang, Qiang Zhai, Hao Shi</i>	463
130	Multi-dimensional Taylor Network Optimal Control for Dynamic Positioning of Offshore Oil Drilling Platform <i>Heng Xue, Hong-Sen Yan, Xin-Shuai Zhu</i>	469
131	Methods of differential fault attack on LBlock with analysis of probability <i>Yang Gao, Yongjuan Wang, Qingjun Yuan, Tao Wang , Xiangbin Wang, Lulu Guo</i>	474
132	A network flow identification scheme based on Wavelet Transform and Chaos Theory <i>Yang Chen , Yonghong Chen</i>	480
135	Elastic Optical Networks for Future Internet and New Defragment Scheme by Extending the Maximal Unoccupied Spectrum Blocks <i>Jianping CHENG, Rui JIANG, Jianhua SHEN</i>	485

136	An Optimized QoS-aware Resource Allocation Scheme for Full-Duplex OFDM Relay Networks with Residual Self-Interference	490
	<i>Xiaolin Ma, Shiwen Ning, Xinhua Liu, Hailan Kuang, Liang Chen</i>	
137	Parameters Tuning Rules Research on Nonlinear Active Disturbance Rejection Control	495
	<i>Jin Wang, Bo Mo, Haiwen Zhu</i>	
138	Fuzzy Anti-windup Compensator Design for Linear Active Disturbance Rejection Control	500
	<i>Jin Wang, Bo Mo, Haiwen Zhu</i>	
139	A Method for Morphological Reconstruction of Long Board Structure based on Segmented Calibration of Resistance Strain Gauges	505
	<i>Qi Lu ,Hesheng Zhang ,Xiaojin Zhu ,Zhiyuan Gao ,Yijia Zhou</i>	
141	Research on Static Var Generator Based on Accurate Linearization and Multi-Sliding Mode	510
	<i>Xiangdong Huang, Lei Ren, Hongguang Pan</i>	
143	The Application Of Gaussian Process Regression In State Of Health Prediction Of Lithium Ion Batteries	515
	<i>Yanqin Zhang, Huafeng Zhang, Zhiwei Tian</i>	
144	Fault Estimation in Finite Frequency Domain for Uncertain Systems with Sensor Fault	520
	<i>Hongxia Li, Yang Wang, Xiaoning Wu, Hongjuan Yu, Rong Li, Xiaolei He</i>	
145	A Unified Root Algorithm in Bignum Arithmetic	527
	<i>Yiping Cheng, Guizhi Cheng</i>	
146	An Internet of Things (IoTs) based Intelligent Life Monitoring System for Vehicles	532
	<i>Fei NI, Jianxiang WEI, Jianhua SHEN</i>	
147	Cooperative Spectrum Sensing using Extreme Learning Machine for Cognitive Radio Networks with Multiple Primary Users	536
	<i>Xiaolin Ma, Shiwen Ning, Xinhua Liu, Hailan Kuang, Youying Hong</i>	
148	Automatic Water Sample Distribution System for USV Operation	541
	<i>Bizhou Lu, Dong Qu, Guigeng Yang, Yulong Xiao, Yan Peng , Junfeng Yao</i>	

149	Design and Implementation of Visually Analytic WebGISystem Based on Marine High-Definition Remote Sensing Data	546
	<i>Ying Wang, Peng Han, Yan Li, Jinkuan Wang</i>	
150	Adaptive Robust High-degree Cubature Filter Based On Target Tracking	552
	<i>Zhiying Peng ,Haibao Xia ,Hang Lu ,Yunshan Xu</i>	
151	Cross Polarization in Large-scale Rectangular Waveguide Slot Array Antenna with Parallel Metallic Plates	558
	<i>Xue Haoren ,J. Pan</i>	
152	Design and Implementation of High Dynamic Satellite Signal Simulator	562
	<i>Hou Yintao ,Xiong Huanyu ,Yu Changren ,Liu Mingxing</i>	
153	Analysis and Simulation of Adaptive Coding and Modulation for Remote Sensing Satellite	567
	<i>Yuyin Wang, Qilin Zhang, Meili Zhang, Linchun Wang</i>	
154	Browser/Server based Experimental Environment for Reinforcement Learning	571
	<i>Hongqiao Zhang ,Lingfei Duan ,Xiaohua Zeng ,Xin Tang</i>	
155	Passive Clock Synchronization for TDOA-based UWB Indoor Positioning Systems	576
	<i>Han Zhang , Le Yang</i>	
156	Designation and Simulation of Environment Laboratory Temperature Control System Based on Adaptive Fuzzy PID	583
	<i>Xiangfu Wu ,JingTao Wu ,Dongmei Li</i>	
157	Parallel Structure of All Digital Timing Synchronization and Realization of FPGA	588
	<i>Shaohua Zhao, Youzheng Wang, Tingyu Qi, Xiaoxi Feng, Yiyi Chen</i>	
158	Cold Chain Logistics Distribution Optimization for Fresh Processing Factory Based on Linear Programming Model	593
	<i>Xue Sun, Chao-Chin Wu, Liang-Rui Chen</i>	
160	Optimizing Sparse Matrix-Vector Multiplication on GPUs via Index Compression	598
	<i>Xue Sun, Kai-Cheng Wei, Lien-Fu Lai, Sung-Han Tsai, Chao-Chin Wu</i>	
161	Robot Path Planning Using Improved Artificial Bee Colony Algorithm	603
	<i>Xiangmin Li, Yonghui Huang, Yijia Zhou, Xiaojin Zhu</i>	
162	Concurrent Learning-based Fault Estimation for a Class of Over-actuated Systems with Loss of Effectiveness Actuator Faults	608
	<i>Long Wang , Sai Yao, Mingwei Guoz, Jianfeng Cheng , Jianhui Zhi</i>	

163	Measurements of wave characteristics based on binocular vision and Zero-crossing method <i>Lei Shi, Li Yang, Honghai Zhu, Xiao Cui, Yu Yu, Shibo Chu</i>	613
164	More Robust Object Tracking via Semi-supervised Metric Learning and Edge Detection <i>LiuJun Zhao , Weizheng Kong , Ming Qin</i>	617
165	A Compact filter based on Substrate Integrated Coaxial Line Technology <i>Wenzhe Liu ,Boyuan Ma ,J. Pan</i>	622
166	A Novel Quality Scalable Stereo Video Coding Algorithm Based on Pattern Recognition <i>Xueyan Zhang, Xinyu Ai, Hongsong Li</i>	626
168	Research on Sentiment Classification for Tang Poetry based on TF-IDF and FP-Growth <i>Gang Li, Jie Li</i>	630
169	An optimal control method for parallel variable speed hydraulic pumps used in High Magnetic Field Laboratory <i>Wenjun Qiu ,Zhengrong Ouyang</i>	635
170	Short-term Forecasting of PV Power Based on the Fuzzy Clustering Algorithm and Support Vector Machine in Smart Distribution Planning <i>Li Shan, Xin Peizhe, Zou Guohui</i>	643
171	Motion control of the self-walking hydrostatic driving tracked tractor <i>Yibo Li , Qiushi Li , Senyue Zhang , Wenan Tan</i>	648
172	Aerial Image Classification Using Color Coherence Vectors and Rotation & Uniform Invariant LBP Descriptors <i>Yibo Li ,Mingjun Liu</i>	653
174	Multi-dimensional Taylor Network Optimal Control of Torpedo Running <i>Long Yang, Hong-Sen Yan , Chuang Jiang</i>	657
176	Infrared Image Vehicle Detection Based on Haar-like Feature <i>Danqi Chen ,Guodong Jin ,Libin Lu ,Lining Tan,Wenle Wei</i>	662
177	Research on Filtering Method of Monopulse Radar Angular Glint Suppression <i>Xinglong Wang, Zhe Xu, Xuemei Wang, Jun Zhang, Hongbin Qiu</i>	668
178	A new identity based blind signature scheme and its application <i>WANG Shuang, YU Hao , LIU Dongnan</i>	672
179	A Novel Image Coding Scheme based on License Plate Recognition <i>Jianbiao Wang , Dawei Liu</i>	677

180	On-line Accurate 3D Positioning Solution for Robotic Large-Scale Assembly Using a Vision System and a 6dof Tracking Unit <i>Sebastian Rendon Fernandez , Adel Olabi , Olivier Gibaru</i>	682
182	Approach of linkage policy decision based on security vulnerability situation and multi factors fusion <i>Weijian Li ,Qianqian Jin ,Bo Zhang ,Qiang Liu,Yuanyi Xia</i>	689
183	Synchronization of Stochastic Memory Neural Networks with Time-varying Delays via Feedback control <i>Xun-Nan Zheng, Ya-Qin Zhang, Dawei Ding</i>	694
184	A Location-Aided Connectivity and Connection Time-Based Clustering Algorithm for HAP-Based Vehicle Ad Hoc Networks <i>Mengge Cai, Kai Liu</i>	702
186	MRUC method for FPGA configuration <i>Teng Jiaojiao , Xie Min</i>	709
188	Robust Virtual Network Mapping Algorithm with Optimal Shared-path Protection <i>Guangyuan Liu, Donghui Han, Jinliang Dai</i>	713
190	A Threat Targets Ranking Method Based on Competition <i>Lu Yuanlei</i>	718
191	Study on diaphragm Fabry-Perot pressure sensor <i>LIU Jin , WANG Jun-Jie</i>	721
193	Neural Attentive Personalization Model for Query Auto-Completion <i>Danyang Jiang, Wanyu Chen, Fei Cai, Honghui Chen</i>	725
194	Distributed Brillouin scattering optical fiber strain sensor technology <i>Yang Zhang,Yaoyu Cao,Yushuang Zhu, Lin Gui,Jiancun Zuo</i>	731
197	Ultra-wideband High Gain Planar Spiral Antenna Design based on Satellite Navigation <i>Fuwei Guo ,Jin Pan</i>	738
198	Design and Implementation of Coverage Testing System Based on Python <i>Yingchun Xia, Lanxiang Jiang, Ruien Zhao, Quan Liu</i>	744
199	Broadcast signal coverage drive test system based on SNMP protocol <i>Ruien Zhao ,Xin Wan ,Yingchun Xia ,Quan Liu</i>	749
200	Research on learner's emotion recognition for intelligent education system <i>Gang Li, Yaoying Wang</i>	754
201	Lightning Arrester Monitor Pointer Meter and Digits Reading Recognition Based on Image Processing	759

202	Design of Home Appliance Control System in Smart Home based on WiFi IoT <i>Zheng XIAO, Deng LIU, Dongsheng CAO, Xinggang WANG</i>	765
203	Neighbor Cache Explore Routing Protocol for VANET based on Trajectory Prediction <i>Mingjing Duan, Chuwen Zhang, Yang Li, Wenquan Xu, Xuefeng Ji , Bin Liu</i>	771
204	Music personalized recommendation system based on improved KNN algorithm <i>Gang Li ,Jingjing Zhang</i>	777
208	Fast automatic classification of input and exit surface laser-induced damage in large-aperture final optics <i>Guodong Liu, Fupeng Wei, Fengdong Chen, Jun Tang, Zhitao Peng, Bingguo Liu</i>	782
209	An Integrated Design Method For Cyber-Physical Production Systems <i>Guangxi Wan, Peng Wang,Lingling Xue, Peng Zeng</i>	791
211	The Remote Monitor and Control of Massive Hydraulic Fracturing <i>Bai Yu</i>	797
212	A Study based on a bank of Kalman Filters design for Gas Turbine Accessory Fault Detection <i>Tao Wang, Wei Xue, Qiuhu Shao</i>	801
213	Research and Application of Compensation Characteristics of DSTATCOM under Unbalanced Load <i>Zaide Xu,Yang Liu,Bei Cao ,Bei Liu ,Shengjian Li</i>	806
214	Analytical model of squeeze film air damping for circular microplates in the free molecular regime <i>Pu Li, Cunhao Lu, Longfei Yang</i>	811
215	Thermoelastic damping analysis of double clamped microbeams with exponentially tapered thickness <i>Pu Li, Hongyue Zhou, Longfei Yang</i>	815
217	Online Identification of Flux Linkage of PMSM with Unbalanced Stator Resistance <i>Wenjing Fang ,Zhonghua Wang ,Dongxue Wang</i>	820
218	Fault Diagnosis for Tray Loader Machine of Power Battery Based on Fault Tree Analysis <i>Ning Zhou ,Wei Li,Jianxin Zhou</i>	824
219	Weather Auto-inductive and Multifunctional Device <i>Xiaoxue Wang, Jie Yang, Chengyong Zhao</i>	829

220	Research on Gesture Recognition Method Based on EMG Signal and Design of Rehabilitation Training System <i>Junyu Shi , Zhitao Dai</i>	835
221	Design of GUI for Portable ECG monitoring system based on Qtopia Core <i>Yu Xiao , Xia Peng</i>	839
222	Sensor-Target Assignment Strategy for Multi-Target Collaborative Tracking under Low Detection Probability <i>Biao Wang, Yongjian Yang, Hesong Huang</i>	845
223	Performace Oriented Edge Computing of Geospatial Information with 3D Scenery <i>Shengen Liu, Xiangning Chen, Bin Qi, Lvwei Zhen</i>	853
224	Solving Power Battery Scheduling Problem Based on TSP <i>Janxin Zhou, Xue Yao, Ning Zhou</i>	859
225	Large-scale machinery monitoring system based on the visual reality <i>Yusi Zhang, Jun Ruan</i>	863
227	Inspection of IC wafer Defects Based on Image Registration <i>Xifeng Liu ,Yuwei Hu</i>	868
229	The Design of Magnetic Couplings Measuring and Controlling System <i>Bin Zhang ,Yongguang Liu ,Xusheng Jing</i>	873
230	Study on target optimization method of cement raw material ingredients <i>Xinzhong Lu, Qingjin Meng, Hongliang Yu</i>	877
231	The Design of Multi-mode Control Strategy and Switching Method for Unmanned Electric Locomotive <i>Meng Li, Lin Yu, Dandi Dong</i>	882
232	Research on the Architecture and Key Technologies of Integrated Platform based on Micro Service <i>Yang Xie ,Xiaolu Zhou , Hui Xie ,Gongliang Li ,Yizheng Tao</i>	887
233	Research on Session Sharing of Distributed Application Service Technology <i>Xiaolu Zhou ,Yang Xie ,Hui Xie ,Guihua Wang</i>	894
234	A Statistic Procedure to Find Formulae for Buffer Size in MPTCP <i>Qining Tan, Xuelei Yang, Lan Zhao, Xing Zhou, Thomas Dreibholz</i>	900
236	Optimization Methods of Motion Control System at The Inflection Point <i>Mei Chen ,Shurun Wang</i>	908
237	Research on Dynamic Switch Migration Strategy Based on FMOPSO <i>Jingmei Li ,Xinliang Hu ,Mengqi Zhang</i>	913

238	High-frequency Characteristics of Drain Current Noise of 40nm n-MOSFETs in Weak Inversion Region <i>Bo Li, Jun Wang</i>	918
239	Dynamic Selection Method for Cooperative Decision-Making Center of Multi-UAV System based on Cloud Trust Model <i>Jie Xu , Qing Guo, Zhaoxia Li</i>	922
240	Analysis on the Correlation between Plunge Milling Parameters and Plunge Milling Force and Force Coefficient <i>Tao Li, Xinyu Huang, Ming Luo</i>	927
242	Protocol application research of SIMPLE and XMPP in instant message products of telecom operators <i>Qingran-Wang , Junyan-Li</i>	937
244	An improved SVM classifier based on multi-verse optimizer for fault diagnosis of autopilot <i>Yongqian Liu , Yuzhu He , Weijia Cui</i>	941
245	EPICS based beam energy measurement system for proton LINAC <i>Jun Yan ,Junxia Wu, Yong Zhang ,Yusheng Xu ,Jingyi Zhang ,Xiao Zhang ,Kewei Gu, Yuan Wei,Long Jing</i>	945
246	Polynomial fuzzy control of Multi-scroll Chen chaotic system via sum-of-squares approach <i>Weiwei Zhang, Bai Zhang, Juntao Pan , Hongtao Shi</i>	950
247	Cooperative Game for the Roles Assignment of the Multi-agent Robot System <i>Wei Na, Liu Mingyong</i>	954
249	Design of an Adaptive Sinusoid Interference Cancellation Algorithm using FPGA and Its Performance Evaluation <i>Kuihua He, Guofei Zhou, Xiaobo Zhou</i>	958
250	User Association in Cache-enabled Ultra Dense Network with JT CoMP <i>Siyun Chen, Ye Wang, Jia Yu, Niannian Wang , Yan Yan</i>	964
251	Electric vehicles charging and discharging control strategy based on independent DC micro-grid <i>Xinhua Yang , Liyang Zhu , Zhenzhong Zhang , Lin Li , Honghui Wang</i>	969
252	Attribute-Based Transfer Learning for Behavior Recognition with Structural Information <i>Yuanfeng Yang ,Zhaobin Liu ,Gang Liu ,Liang Zhang</i>	974
254	An Active Voltage Controller of SiC MOSFET for Reduced EMI Generation <i>Jinling Yang ,Jingpo Shi ,Tongkai Cui</i>	979

255	Parameter identification of synchronous condenser based on Grid Searching Method of Initial Values <i>Andong Wang, Fuchun Sun , Zeming Zheng, Jinghong Zheng</i>	984
256	Design Optimization of Axial-Flux Eddy Current Coupler <i>Haixin Zhang , Dazhi Wang</i>	989
257	Torque ripple reduction of four-phase SRM based on DTC method <i>Yufei Han, Ping Xu, Qishuang Ma</i>	994
258	A 16-BIT 200KS/S Multi-channel SAR ADC in 55nm CMOS <i>Guohe Zhang, Tian Zhao, Haifeng Zhang, Feng Liang</i>	998
259	Low power consumption and low area capacitor array for 16-bit 1-MS/s SAR ADC <i>Hongyi Wang, Siyuan Wang, Yidong Yuan, Guohe Zhang</i>	1003
260	A Node Localization Algorithm Based on Connection Constraint for WSNs <i>Xingyu Pi, Yuanbo Chai</i>	1007
261	A Digital Self-Calibration Technique For 16-bit SAR ADC <i>Feng Liang, Yunan Xue, Dejian Li, Hongyi Wang</i>	1011
262	An Error Correction Method for Code Cable Displacement Sensor <i>Chen Zhaojun ,Tan Jianping ,Shi Lixiang ,Xue Shaohua ,Huang Tianran</i>	1015
263	A class of mixed logical system and using in energy-saving control of central air conditioning <i>Yan Zhang ,Xiaoli Chu ,Yongqiang Liu</i>	1020
264	Research on positioning system based on Zigbee communication <i>Dongmei Yan ,Bing Kang ,Hui Zhong , Ruolin Wang</i>	1027
269	A New Method of Image Detection for Small Datasets under the Framework of YOLO Network <i>Guanqing Li, Zhiyong Song , Qiang Fu</i>	1031
271	Low-power smart home node design based on STM32L433 <i>Tong Qiang,Zhou Xiaofeng, Liang Likai , Zhang Yongshuai,Wang Han</i>	1036
272	Research on Black Hat SEO Behaviour Measurement <i>Xiulin Ma</i>	1041
274	Investigations on a measurement algorithm of the slab surface temperature based on linear array CCD <i>Yi Zhang, Ding Ding, Yibo Zhao</i>	1046
276	Improving the Frequency Switching of Phase-locked Loop Using Pre-control Technique	1051

Bo Tang, Kaiyu Qin

- 278 A Fast and Adaptive Algorithm for Air Compound Target Tracking** **1055**
Guobing Li ,Hongling Zhao ,Jian Zhang ,Jiangfu Zhou ,Ping Wang
- 279 Design of Aviation Power Supply Test Information Management and Reporting Automatic Generation System** **1060**
Jiqiang Xia, Chen Wang, Jiawen He, Chunming Geng
- 280 Sensorless Control of a Four Phase Switched Reluctance Motor Using Pulse Injection** **1066**
Xuejiao Deng, Qishuang Ma, Ping Xu
- 281 Asymmetric Channel Based Networking Algorithm of Broadband Power Line Communications** **1071**
Chao Huo, Di Mu, Fei Gao
- 282 Pulse waveform analysis for pregnancy diagnosis based on machine learning** **1075**
Xin Lu, Yifan Wu, Ruijian Yan, Shiyue Cao, Kejia Wang, Shenghong Mou, Zhiyuan Cheng
- 283 Light Propagation Prediction through Multimode Optical Fibers with a Deep Neural Network** **1080**
Pengfei Fan, Liang Deng, Lei Su
- 284 Load Frequency Control of Interconnected Power System With Wind Power Based on Active Disturbance Rejection Control** **1085**
Mengnan Zhao ,Jiangbin Zhang, Kai Ren
- 285 Research on recognition algorithm for intra pulse modulation of radar signals** **1092**
Shuhao Wang
- 286 Double Cross Algorithm of Improved TV Image Inpainting Model** **1097**
Yulei Jiang, Jing Liu, Liyan Wang
- 287 Wind Turbine Condition Monitoring based on SCADA Data Analysis** **1101**
Haolin Yin, Rong Jia, Fuqi Ma, Dameng Wang
- 290 3D Autonomous Tracking of Buried Pipelines via a UAV in a Low Altitude** **1106**
Xiaoqian Huang,Amit Shukla
- 291 A T-S Fuzzy Model-Based Algorithm for Blood Glucose Control in Diabetic Patients** **1110**
Zigui Kang, Juntao Pan, Weiwei Zhang, Xiaoyan Zou
- 292 An Improved Active Gate Drive Method for SiC MOSFET Better Switching Performance** **1114**
Congwen Xu ,Qishuang Ma,Ping Xu ,Tongkai Cui ,Poming Zhang

293	An Efficient Near-Field Parallel Subarray Beamforming for Portable 3D Imaging Sonar <i>Dongdong Zhao, Xuesong Liu, Fan Zhou, Rongxin Jiang, Yingtian Hu, Yaowu Chen</i>	1120
294	Non-cooperative Target Imaging based on Joint CSI-ISAR method <i>Song Nie, Ming Hao, Long Zhuang, Ying Liu</i>	1125
295	Diagnosis and Analysis of Wall Bushing Typical Partial Discharge Fault in Switchgear <i>Zhixiang Liu, Yongxiang Li, Zhenyu Zhang, Liqiang Ma, Qingsong Chen</i>	1129
296	Condition-based load balancing algorithm in distributed rendering <i>Jiyu Mao, Shuang Feng</i>	1133
297	A Novel Fault Location Algorithm for UHVDC Transmission Lines <i>Wanjie Zhang, Yu Shi, Xin Su, Huanhuan Yin, Fanbin Zhang, Xin Wang, Kuan Li</i>	1140
298	Research on Influence of Three-phase Current Unbalance on Transformer Losses and the Top-oil Temperature <i>Chao Yang, Xingong Cheng, Fang Chen, Lin Qiao</i>	1145
299	Analysis and Research on Power Flow Entropy Index of Power System <i>Shen Zhang, Yongxiang Li, Tao Jin, Hua Yu, Gang Yang, Zhixiang Liu</i>	1150
300	Research on Music Emotion Classification Based on Lyrics and Audio <i>Wanglei Shi, Shuang Feng</i>	1154
302	Research on Chinese Sentence Similarity Calculation Method Based on Multiple Features <i>Chenyang Wu, Jinbo Wang, Xiaohua Wang, Yunyun Ma</i>	1160
303	Study on Post-earthquake Evacuation Model Based on Relationship Grouping <i>Tongshuang Lv, Hongguo Wang, Zengzhen Shao, Yanhui Ding, Weizhi Xu</i>	1166
304	Sentiment Analysis on Chinese Hotel Reviews with Doc2Vec and Classifiers <i>Qianjun Shuai, Yamei Huang, Libiao Jin, Long Pang</i>	1171
306	A Novel Binary Chaotic Cloud Flower Pollination Algorithm for Analog Fault Diagnosis <i>Weijia Cui, Yuzhu He, Dongsheng Zhao, Jing Zhu</i>	1175
309	Research on Vulnerability Classification Method Based on DMO-PSO-SVM Algorithm <i>Huiting Yang, Wenbin Guo, Zhenwan Zou, Yunxiao Bai, Xu Wang, Yutao Li</i>	1180
313	Testing Research on Auxiliary Circuit Oscillation Characteristic Parameters for High Voltage DC Transfer Switch <i>Yongxiang Li, Jianhua Lian, Jao Jin, Zhixiang Liu, Zhenyu Zhang, Jingjin Cao</i>	1184

314	Efficient Encoding of Quasi-Cyclic Low-Density Parity-Check Codes <i>Tingting Liang, Peng Zhang, Changyin Liu , Jin Liu</i>	1189
315	Construction of Semantic-based Traditional Chinese Medicine Prescription Knowledge Graph <i>Fang Miao, Huixin Liu, Yamei Huang, Chenming Liu, Xinyi Wu</i>	1194
316	Target Detection for Remote Sensing Image Based on Multiple ERP Components <i>Shangyi Xiao, Li Tong, Ningning Liang, Jun Shu, Bin Yan , Ying Zeng</i>	1199
317	Fuzzy Neural Network PID Control Based on RBF Neural Network for Variable Configuration Spacecraft <i>Ran Wang, Zhicheng Zhou, Guangji Qu</i>	1203
318	Intrusion Detection Model of SCADA Using Graphical Features <i>Dinghua Wang ,Dongqin Feng</i>	1208
319	Benchmarking Deepsat Dataset with a Simple Convolutional Neural Network <i>Rabia Munsaf Khan, Sajid Ghuffar</i>	1215
320	Channel Prediction Based Network Access Control Algorithm of Powerline Carrier and Wireless Converged Communications <i>Licheng Wang, Libin Zheng, Yingying Hou, Yanbin Song</i>	1221
321	Research on the Problem of Virtual Cell Reconfiguration based on Resource Element under New Task Insertion <i>Ying Zhao, Yingwu Chen, Chunlong Song, Zhiwei Yang</i>	1225
322	Design and Implementation of Ant Colony Routing in Internet of Things <i>Yanqing Pang, Li Liu</i>	1230
323	Design of Testing System for Automotive Power Electronic Unit Based on Energy-consuming Platform <i>Xiangwen Fan ,Minglun Fang ,Yongyi He ,Pengfei Cheng</i>	1236
325	Simulation Study of Cylindrical Helical Antenna based on Liquid Metal <i>Pengshuai Zheng, Binzhen Zhang, Junping Duan, Wanjun Wang, Ying Tian</i>	1244
326	Flexible Dual-frequency Circularly Polarized Antenna <i>Xuechen Lin, Binzhen Zhang, Junping Duan, Ying Tian</i>	1248
329	Mechanical fault diagnosis method for OLTC based on MPE and K-means++ algorithm <i>Yong Zhang, Bingbing Chen, Yan Xu, Liang Wang, Honghua Xu, Hongzhong Ma</i>	1252
332	Content-based Image Retrieval System via Deep Learning Method	1257

Xinyu Tian, Qinghe Zheng, Jianping Xing

A061 A Dynamic Analysis Method of Sensitive Factors for Processing State Oriented to Big Data 1262

Liping Zhao, Lu Wang, Pan Xing, Lianlian Wang, Sheng Hu

A125 Entertainer Evaluation System Research Based on Index Model and Text Analysis 1267

Fulian Yin, Pei Su, Ge Su, Sitong Li

A157 Analysis and Comparison of Influence Factors of Movie Box Office In China 1273

Xi Feng, Xinran Wang

A295 The Research on IOT Security Architecture and Its Key Technologies 1277

Shan Liu, Keming Yue, Yu Zhang, Hua Yang, Lu Liu, Xiaorong Duan

A371 Time-position mapping method for monitoring data and cutting position 1281

Weihong Xia, Dinghua Zhang, Ming Luo, Ying Zhang

A454 Modeling and Simulation of Economic Evaluation of Regional Railway Projects in Western China Based on System Dynamics 1288

Mo Junwen, Liu Xian

C106 Design of Reconfigurable Real-time Telemetry Monitoring and Quantitative Management System for Remote Sensing Satellite In Orbit 1293

Wenping Wang, Yahang Zhang, Xianghui Wang, Hao Xu, Hexiang Tian

C107 Design and Simulation of High Precision Sigma-Delta Modulator 1298

Wenjie Qiu, Jingjin Fan, Zihao Li, Qisheng Zhang

C108 Dissolved Oxygen Detection Based on Light-to-Frequency Conversion 1302

Guohua Chen, Bin Li

C111 Active Guidance Mechanism of University Public Opinion Based on CBR and BDI Agent 1307

Yu Weihong

C114 Distribution Network Inspection Route Planning and the Application of Inspection Automatic Control Technique 1312

Shangwei Yang, Haipeng Wang, Zhigang Ren, Shiyong Mu, Jianxiang Li, Jinlong

C117 Study on Propagation Characteristics of Elastic Waves in Coal Measure Strata with Small Faults 1316

Hongyu Sun, Yana Wang, Lizhi Che, Yinjing Guo, Geng Chen, Xiaoli Yi

C118	Research on Tibetan Web Standard Text Data Model <i>Pu Cuo , Cai Ren, JianChao Hong</i>	1321
C119	Study on Section Location of Medium Voltage Distribution Network Based on Fifth Harmonic Current Fault Component <i>Shuping Gao, Zihao Lin</i>	1326
C122	Research on the Coordinated Control of the Integrated Wind-PV-ES Microgrid System <i>Hanyue Wang , Ruiyuan Ding , Xiaochun Mou , Houcheng Chu</i>	1332
C124	Development and Application of Partial Discharge Detection Robot in Switchgear <i>Yiqing Luan , Haipeng Wang, Wei Xu, Dazhou Zhou</i>	1337
C127	Research on Live Working Robot Based on Weak Rigid Master-slave Control Algorithm <i>Jizhi Liu, Hongwei Ji, Yabo Zhao, Huadong Zhang, Jinlong Zhao</i>	1344
C128	Investigations on Electromagnetic Operating Mechanism of DC Vacuum Circuit Breaker <i>Deshi Liang, Wenliang Dong, Sheng Zhang, Jiyan Zou, Yanping Wang, Zhisen Wang</i>	1349
C129	The Rearch Of Pseudo-Random Signal Generator Based On FPGA <i>Yuan Zhang, Xiaofeng Shi</i>	1353
C132	Influences of Track Random Irregularity on the Performance of Levitation Control System of Medium-speed Maglev Train <i>Liang Xiao , Zong Bin</i>	1356
C133	The Design of Vehicle Headlights Switching System Based on Support Vector Machine(SVM) <i>Jianhao Yang ,Xiaoqing Shen ,Fan Guo ,Chuqiao Yi</i>	1361
C134	Anomaly Detection of Railway Catenary Based on Deep Convolutional Generative Adversarial Networks <i>Pei Yang , Weidong Jin, Peng Tang</i>	1366
C135	Aluminum alloy defects testing using Magneto-acousto-electrical <i>Jingxiang Lv ,Guoqiang Liu</i>	1371
C136	Investigations on A New Synthetic Test of DC Vacuum Circuit Breaker <i>Deshi Liang, Xingyu Guo, Yang Gao, Jiyan Zou, Zhisen Wang</i>	1376
C137	Big-Data-Based Modeling of Electricity Consumption Behavior <i>Ying Chen, Wei Xian Xue , Xing Long Xie</i>	1380
C138	The Influence of the Ratio of Hydropower Unit Capacity on the Stability of Primary Frequency Regulation of Power Grid	1388

- C142 Research on optimization of DAG task scheduling model based on heterogeneous multicore processor** *1393*
Xiaohui Cheng , Chaopeng Tan, Yi Zhang
- C143 Research on Trust Management Model of Wireless Sensor Networks** *1397*
Xiaohui Cheng, Yang Luo , Qiong Gui
- C144 Research on Master-slave Controlling Remote Operation of Live Working Robots in Agricultural Distribution Network** *1401*
Yuliang Zhao, Hui Qi, Wei Xu, Jianxiang Li, Jinlong Zhao
- C145 Target detection based on automatic threshold edge detection and template matching algorithm in GPR** *1406*
Wentai Lei, Min Man , Ronghua Shi, Gengye Liu, Qingyuan Gu
- C147 Three-dimensional Reconstruction of Coal-rock Microscopic Image using Pattern Density Function and Genetic Algorithm** *1411*
Shuangcen Li, Chaofeng Li, Yiwen Ju
- C148 New Algorithm for Adaptive Current Protection Setting of Fan Connected to Distribution Network** *1415*
Yanyang Kang , Zhiying Duan
- C151 Accidents Occur Easily Waterway Judgment Method with Potential for Safety Improvement** *1420*
Zhang shukui, Feng maoyan,Su wenming, Li Jing
- C152 Development of Rail Transit Bidirectional Multilevel Converter Measurement and Control System** *1425*
Quanzhu Zhang, Yuanhong Li, Yonghong Deng
- C153 Study on energy absorption scheme of rail transit** *1430*
Yonghong Deng, Yuanhong Li, Haiyu Chen
- C156 Study on the Optimal Scheduling of a Hybrid Wind-Solar-Pumped Storage Power Generation System** *1434*
You Lv,Xiangyang Yu,Tonggengri Yue
- C157 Modeling Method of Operational Task Combined with IDEF and UML** *1443*
Mian Fu , Dandan Wang, Jiali Wang,Miaomiao Li
- C158 Modeling and simulation analysis of Hybrid Bipolar HVDC system based on LCC-HVDC and VSC-HVDC** *1448*
Shuping Gao, Hangjian Zhu, Baohui Zhang, Guobing Song
- C159 Operation Expenditure Forecasting Model of Regional Power Grid Based on LS-SVM** *1453*

Yujie Xu, Yue Lv, Heng Zhang, Yan Zheng, Shujun Zhai

- C160 Breeding Data Service Platform Based on the New Architecture of Cloud Technology** *1457*
Yuan Yue, Gang Zhao, Ruoying Sun
- C162 Cooperative CSMA/CA: A MAC Protocol for Cooperative Wireless PMP/Mesh Hybrid Networks** *1464*
Jinxiong Zhao, Xun Zhang, Xiaoqin Zhu, Bo Zhao, Guohua Wang, Xuejun Zhang, Bao jing Chen, Jipeng Bai, Jingna Zhang
- C163 The Research of Micro-blog User Influence Ranking Algorithm SDD-rank** *1469*
Chenyu Ni, Dongfei Liu, Shoukun Yan
- C166 Application of Infrared Imaging Processing in the Monitoring of Temperature in Lees Airing** *1475*
Shaotang Cai, Xiaohong Ren, Lian Xu, Shi Fan
- C167 Engineering Setting Method for Parameters of Shipborne Servo PID Controller** *1480*
Li-li XIA, Si-fang LIU, Sheng LIANG, Xing-yuan XU
- C169 Study on the Strategy of Neutral Point Potential Control of Three-level Inverter** *1484*
Fan Tian, Xu Jun, Wang Zeyu, LI JI
- C170 Research on Load Balancing Method in Cloud Computing** *1489*
Qingyu Wang, Dongfei Liu
- C172 Risk Assessment of Power Information Risk Security Based on Risk Matrix** *1494*
Wang xu, Chen tao, Wang yujie, Guo qinrui, Teng yangxin
- C174 A cooperative controller based on embedded Soft PLC technology of tobacco primary processing equipment** *1499*
GUO Ben, LI Han-ying, SHAO Chang-ling, LIANG Jie, WANG You-li, ZHU Hui-ping
- C176 Memory compression for Recursive Flow Classification Algorithm in Network Packet Processing Devices** *1502*
Xianfeng Li, Yanhua Shao
- C177 Prediction Model for Ship Traffic Flow Considering Periodic Fluctuation Factors** *1506*
Wan jianxia, Li jing, Zhang shukui
- C178 A Fault Section Location Method Based on Energy Remainder of Generalized S-Transform for Single-phase Ground Fault of Distribution Networks** *1511*
Zhenjiang Pang, Jun Du, Fan Jiang, Lianjie He, Yuling Li, Lixiang Qin, Yan Li
- C179 Analysis of temperature characteristics of optical thin film interleaves** *1516*
Youcheng Liang, Haitao Chen
- C180 Analysis on the invulnerability of network based on scale-free network** *1519*

C181	Energy Consumption Analysis of a Linear Motor <i>Qiushan Chen , Ningxia Yin , Xiaoqin Chen</i>	1523
C182	Soc Estimation Of Vanadium Redox Flow Battery Based On OCV-DKF Algorithm <i>Tao Zheng, Wenpin Lu, Xin Li, Ya Qiu, Ling Yu, Wei Lu</i>	1528
C184	An Efficient Collision Detection Algorithm for the Dual-Robot Coordination System <i>Minxiu Kong ,Yuhao Bai</i>	1533
C185	An Algorithm for Feature Extraction of Weld Groove based on Laser Vision <i>Dianyong Yu , Qiang Liao</i>	1538
C188	Design and Development of Camera Simulation System <i>Yuchen Wang , Wenhui Zhang</i>	1543
C189	Research on Reactive Compensation Technology Based on SVC-APF <i>Siwen Cheng,Nana Zhang,Xikai Cui,Zhouxing Fu</i>	1547
C191	Design of pure electric freight car system based on orthogonal optimization method <i>Jia Qiyang</i>	1552
C193	Implementation of Synchronous Clock based on the Coal Mine Exploration Radar <i>Guofu Wang ,Zhi Wang ,Jincai Ye ,Faquan Zhang</i>	1558
C194	Research on gesture recognition based on sEMG and inertial sensor fusion <i>Jialiang Fang,Bingji Xu, Xingqun Zhou , Huan Qi</i>	1562
C195	Unsupervised Change Detection in Remote sensing Image Based on Image Fusion in Nonsampled Shearlet Transform Domain and fuzzy k-means clustering <i>Duliang Lv ,Feng Li,QingRui Guo ,Xu Wang ,Tao Chen</i>	1568
C197	Design and Implementation of Unmanned Surface Vehicle for Water Quality Monitoring <i>Huiru Cao, Zhongwei Guo, Yucheng Gu, Jiabin Zhou</i>	1574
C198	Research on Multi-factor Bidirectional Dynamic Identification Based on SMS <i>Shengju Yang , Jie Meng</i>	1578
C199	Study on the weapon target assignment problem using hybrid genetic algorithm <i>Mian Fu , Ni Sun, Miaomiao Li</i>	1583
C201	User Authentication Protocol Based On Chebyshev Polynomial For Wireless Sensor Networks <i>Xuerang Guo, Qingrui Guo, Yaping Li, Zhijun Zhang, Peng Xie, Shali Liu, Yeersen Sailike</i>	1588

C202	Prewitt edge detection based on BM3D image denoising <i>Hanmin Ye , Bin Shen , Shili Yan</i>	1593
C204	Study on Decision Making of Travel Mode Based on Fuzzy <i>Xiao Yan ,Lin Zhang,Jianyuan Gan ,Xiaoqing Huang</i>	1598
C205	Research on Optimal Scheduling of Energy Storage System Based on Particle Swarm Optimization <i>Wang Licui</i>	1604
C206	Research of Special Instructions for Finite Field X Multiplications of Cryptographic Algorithms <i>Longmei Nan ,Xiaoyang Zeng ,Qi Ding ,Wei Li,Yiran Du ,Lin Chen</i>	1608
C207	Blind Source Separation Based on Variational Bayesian Independent Component Analysis <i>Chunli Wang ,Yan Xu , Minan Tang , Lei Wang</i>	1614
C209	Research on Multi-objective Test Case Generation Based on Cuckoo Search <i>He Haixian, Feng jing</i>	1619
C210	A Software managemente Method for the LUT <i>Shunfang Liu ,Wangshen,Hongbo Cai ,Jian Yan Wei , Caoli</i>	1624
C211	Speaker Recognition based on Multimodal LSTM using Depth-Gate <i>CHEN Huangkang ,CHEN Ying</i>	1629
C212	Object detection based on Online hard examples mining with residual network <i>Zhang Chao ,Chen Ying</i>	1634
C214	Design of Multichannel High-speed Synchronous Data Acquisition System Based on Multi-FPGA and Distributed Control Strategy <i>Tingzhe Pan ,Guogang Zhang ,Youdang Xu ,Zhengxiang Song ,Jianhua Wang</i>	1639
C215	Research on the error correction method of the shaft angle encoder's sudden change <i>Hui Ji ,Ganlin Yang ,Haiyu Ji ,Xudong Zhang</i>	1644
C216	Exploring Topological Graph Passwords of Information Security By Chinese <i>Yarong MU, Bing YAO</i>	1648
C217	On Space and Design of Topological Graphic Passwords For Information Networks <i>Bing Yao, Xiaohui Zhang, Yarong Mu, Hui Sun, Hongyu Wang, Mingjun Zhang, Sihua Yang</i>	1653
C218	Graph Module-k Odd-elegant Labelling Towards Topological Graphical Passwords <i>Xiaohui ZHANG, Yarong MU, Hui SUN, Bing YAO</i>	1660

C219	Paper Design of Circulation Process Model for Sharing Circulating Packaging of the Express Delivery Industry Based on Lease Mode <i>Ping Li ,Yanping Du ,Lei Zhu ,Mengye Li</i>	1666
C220	LSTM-CNN Hybrid Model for Text Classification <i>Jiarui Zhang , Yingxiang Li , Juan Tian , Tongyan Li</i>	1675
C221	Research on the Trusted Immune Technology of Perceptual Layer of Big Data Platform of Work Safety <i>Lili Wu , Zhengmin Li , Tao Chen</i>	1681
C222	A Fast Fusion Method for Multi-exposure Image in YUV Color Space <i>Yanjie Liu, Dasong Wang, Jianbo Zhang , Xi Chen</i>	1685
C223	Binocular Camera Calibration Based on Threedimensional Reconstruction Error <i>Changying Liu, Tongtong Li, Yang Liu, Tianhao Wang, Dapeng Yang</i>	1690
C224	Medical image segmentation based on improved watershed algorithm <i>Tongping Shen , Yuanmao Wang</i>	1695
C227	Design of a Batch Sampling Device for Cigarettes Based on PLC Technology <i>Wei Ying, Guang Zhang, Chunshan Jin</i>	1699
C228	The Simulation Analysis of Control System of Pure Electric Pick-up Truck Motor <i>Fushan Zuo,Xin Zhang,Yan Zhu, Ying Xu, Xiao Lv, Chungui Qian</i>	1704
C229	Innovative Social Governance Mode of Information Sharing Platform in the Era of Big Data <i>Lin Yuhui</i>	1712
C230	Analysis of Buried Cable Signal in Three-dimensional Complicated Soil Structure <i>Xue Luo ,Jing Rui ,Caixian Wu ,Feng Lu,Lijun Wen ,Wei Li ,Zhengjie Cai</i>	1716
C231	Control System Design of Evaporator Based on PCS7 and SMPT-1000 <i>Zaiying Wang ,Fang Luo</i>	1723
C233	Spiking neural network with synaptic plasticity for recognition <i>Jing Li , Bo Liu, Weixin Gao, Xiaoyan Huang</i>	1728
C234	Space Load Forecasting Considering Distributed Energy and Electric Vehicles <i>Tianlun Han ,Anjia Mao ,Bin Ye ,Shengyu Kuai</i>	1733
C235	Load ratio optimization of Urban Power Grid Considering penetration of electric vehicles <i>Tianlun Han,Anjia Mao ,Shengyu Kuai,Bin Ye</i>	1738
C239	An approach for measuring and separating error of machine tool based on KGM <i>Yanbo Wang,Tao Tao ,Gedong Jiang , Yang Hui , Guangri Liang</i>	1743

C243	On Agricultural Machinery Operation System of Beidou Navigation System <i>Zhenzhen Dong, Jie Duan, Maoli Wang, Jingbo Zhao, Hao Wang</i>	1748
C244	Study on direct torque control system of three-level inverter permanent magnet synchronous motor <i>Wang Zeyu, Xu Jun, Fan Tian, LI JI</i>	1752
C249	A New Substrate Integrated Antenna for Wireless Power Transfer <i>Rong Zhang, Yajuan Zhao, Zekui Zhang, Chao Li, Xianqi Lin</i>	1757
C250	Research on the Method of Multi-source Information Fusion Based on Bayesian Theory <i>Hao Cheng, Jin Zhao, Mian Fu</i>	1760
C255	A review on deep learning based image steganalysis <i>Yong-he TANG, Lie-hui JIANG, Hong-qi HE, Wei-yu DONG</i>	1764
C256	A Secure Dual-Core Processor Design for Embedded Terminal Device <i>Xiaosheng Wang, Yongfei Han, Yanchun Yang</i>	1771
C257	A Solution on Tibetan Speech Synthesis Based on HMM <i>Yan Zhou, Dongcai Zhao, Fuzhao Wang</i>	1776
C258	A polynomial regression method based on Trans-dimensional Markov Chain Monte Carlo <i>Yajun Chen, Peng He, Wanjun Chen, Fan Zhao</i>	1781
C261	Research on Comprehensive Risk of Network Assets and Vulnerabilities <i>Liang Fei, Feng Jing</i>	1787
C262	Joint optimization of Maintenance Force and Spare Parts Provision for k-out-of-n System in Wartime <i>Qiang Wang, Zhonghua Cheng, Qiaoran Ran, Yadong Wang</i>	1792
C263	Research on Robot Path Planning Based on Fuzzy Neural Network Algorithm <i>Hao Wang, Jie Duan, Maoli Wang, Jingbo Zhao, Zhenzhen Dong</i>	1800
C265	Characteristic Impedance Analysis of Transmission Lines Considering Frequency Characteristics <i>Hanlin Bai, Fan Gan, Nana Zhang, Yunge Li</i>	1804
C266	Research on a Bridgeless PFC Topology in Space Nuclear Power System <i>Yang Jin, Shichao Liu, Huiying Liu, Yang Li</i>	1809
C267	A Method for Avoiding Track Coalescence in Clutter Environment <i>Yabo Xu, Ke Xu, Jianwei Wan, Zhengda Xiong</i>	1814

C269	Research and Application of Optimization Method for Iron and Steel Sintering Ingredients <i>Yibo Wang ,Qinghe Hu</i>	1819
C271	A congestion control strategy for opportunistic network <i>Bin Wang, Lu Liu, Feng Li, Yangxin Teng, Xuerang Guo, Yutao Li</i>	1824
C273	Design of Adaptive Inversion Control for a Hypersonic Vehicle <i>Zhao Si-yuan , LI Xiao-bing , HE Yang-guang , LI Xing-ge</i>	1829
C278	Research on Development of Face Recognition Based on Patent Analysis <i>Junfeng Yu, Shiwei Zhu, Beibei Xu, Sisi Li, Mingjun Zhang</i>	1835
C279	Triaxial Contact Detumbling of Large-scale Space Debris <i>Kui Sun, Zhe Wang, Yuanfei Zhang , Hong Liu</i>	1840
C280	An intelligent value chain model with internet enterprises based on blockchain <i>Xiang Liu, Qingkang Zhu</i>	1845
C282	An automatic pattern recognition value system with listed banks based on blockchain <i>Xiang Liu , Tiantian Yu</i>	1850
C283	Adaptive Artificial Bee Colony Algorithm Based on Orthogonal Design in Path Design <i>Xu Shijie</i>	1855
C284	Radar Anti-jamming Technology based on Waveform Watermarking <i>Lei Bao , Chunyang Wang , Xin Li , Ming Tan , Juan Bai , Mengyang Cui , Kewei Xin</i>	1860
C287	SISO System Model Identification and Fault Diagnosis <i>Yuguo Zhou, Yongle Fan, Lina Zhao, Shanshan Yin</i>	1866
C289	The research on customer classification of B2C platform based on k-means algorithm <i>Xiangtao Li , Chen Li</i>	1871
C290	A Circularly Polarized Microstrip UHF RFID Reader Antenna with the Impedance Match Easily Advantage <i>Hongtu Zhao , Zhiyong Luo , Xun Shen , Bin Zhang</i>	1876
C291	The Research and Analysis in Decision Tree Algorithm Based on C4.5 Algorithm <i>Huan Hao, Tieming Chen, Jing Lu, Jie Liu, Xiaodan Ma</i>	1882
C292	Guidance Line Identification for Agricultural Mobile Robot Based on Machine Vision <i>Qingkuan Meng, Xiayi Hao , Yingmei Zhang, Genghuang Yang</i>	1887

C293	New Feature Extraction Algorithm for Distribution Network Running Signals Based on Wavelet Transform <i>Rui Li, Chun-fang Zheng, Zhi-hong Mi, Mi Yang, Nan-hua Yu</i>	1894
C294	A Parameter Estimation Algorithm for Frequency-Hopping Signals with Stable Noise <i>Yuncheng Yang, Xueli Sun, Zhaogen Zhong</i>	1898
C295	Uncertainty Analysis of Heavy Metal Contamination Assessment in Daxia River Basin <i>Shengwei Wang, Miao Wang, Tianlong Lou, Yue Zhang</i>	1905
C296	Research on the Algorithm of Building Object Boundary Extraction Based on Oblique Photographic Model <i>Xiaoyan Ma, Xiaopan Zhang, Lei Shi</i>	1909
C297	Application Prospect of Wireless Private Network Based on Key Technology of Carrier Aggregation and Spectrum Sensing in Xinjiang Power Access Network <i>Ling He, Jizhao Yi, Di Wang, Mingxuan Li</i>	1913
C298	WSNs Node Localization Algorithm Based on Mobile Robot Assistance <i>Xiaofei Chen, Gang Zhang, Chengling Lu, Jun hui Cheng</i>	1917
C299	Design of Portable CNC Torque Wrench Controller <i>Xiaowu Wang, Yeqing Li, Peigang Wang</i>	1922
C300	Terahertz Essential Devices Technique Research Based on Quantum Communication <i>Jianhua Du</i>	1927
C301	Residential Lighting System <i>Jianbo Zhang, Yin Qun, Gu Ji</i>	1931
C302	Design and Realization of Bus Automatic Reporting Station System <i>Jianbo Zhang, Yin Qun, Gu Ji</i>	1935
C303	Self-balancing car based on ARDUINO UNO R3 <i>BOLUN ZENG, JIANBO ZHANG, LANG CHEN, YAO WANG</i>	1939
C306	Method for Movement Direction Judgment of Secret Carriers Based on Multi-frequency RFID <i>Hongshan Kong, Bin Yu</i>	1944
C307	Hyperbolic Feature Detection and Radius Calculation of Underground Pipeline <i>Xue Luo, Tao He, Lijun Wen, Wei Li, Lingyun Tang, Zhengjie Cai</i>	1949
C308	A Novel Method for Feature Extraction and Recognition of Echo Signal of Underground Cable	1955

*Jisheng Huang ,Ping Guo ,Yongmao Tang ,Kang Yao,Wei Li ,Lingyun Tang
,Zhengjie Cai*

- C309 Optimal Energy-Efficient for OFDM-Based Cognitive Relay Networks with Sensing Errors** **1960**
Linna Hu , Qian Chen
- C310 Design of a Route Planning Method for Inspecting Distribution Network** **1965**
Peng Xiao , Shiyou Mu, Yan Wen , Mengchao Fu , Jianxiang Li, Haipeng Wang
- C311 Observer-Based Decentralized Event-triggered Consensus for Leader-following Linear Multi-Agent Systems** **1969**
Jiarong Li, Xiang Wu, Qiuying Li , Yefeng Li
- C312 Finite-time Distributed Event-triggered Consensus Control for Leader-following General Linear Multi-Agent Systems** **1974**
Jiarong Li, Xiang Wu, Qiuying Li , Yefeng Li
- C313 Research on Bottom Drag Prevention for an Unmanned Deepwater Collection** **1979**
Yu-long XIAO, Chuan ZHU , Jun-feng YAO, Yan PENG, Gui-geng YANG , Qi-xing CHENG
- C315 Landing Control Scheme of Vertical Takeoff and Landing Fixed-wing UAV** **1984**
Tianxing Chang, Zhiming Guo, Jiawei Zhang, Liaoni Wu
- C317 Design and Analysis of an Oil-contained Water Sampling Device for Unmanned Surface Vehicle** **1989**
Guigeng Yang ,Xiang Wu ,Jiaxin Chen ,Bizhou Lu ,Haijun Chen,Chuan Zhu
- C319 Term Extraction in Chinese Patent Claim** **1994**
Zhenning Chang , Xueqiang Lv
- C321 Foot Plantar Pressure Measurement System Based on Flexible Force-Sensitive Sensor and its Clinical Application** **1998**
Bochen Li ,Yi Liu , Weihao Li , Shengqiang Xu , Xianjun Yang,Yining Sun
- C322 The Optimization of FFT Algorithm Based with Parallel Computing on GPU** **2003**
Zhicheng Zhao, Yaqun Zhao
- C323 Research and Design of a Path Planning Algorithm in the Intelligent Logistics Sorting System** **2008**
Jianqiang Mei , Yiran Zhou
- C324 Research on Grain-128's cryptosystem recognition** **2013**
Zhicheng Zhao, Yaqun Zhao, Fengmei Liu
- C325 Equalization Charge-discharge Control Strategy for Series-connected Vanadium Redox Flow Batteries Based on LC Oscillation Circuit** **2018**
Xin Li, Yanqing Mo, Na Di, Ya Qiu

C326	Image Enlargement Research based on New Power Series - Newton Interpolation Algorithm <i>Lihua Hao ,Naifan Zhang ,Zhumao Lu ,Yangjun Zhang</i>	2023
C327	Hyperbolic Signal Of Undulating Soil Structure <i>Xue Luo,Feng Lu ,He Yuan ,Jiajie Wang ,Wei Li,Lingyun Tang ,Zhengjie Cai</i>	2028
C328	Application of an Improved Neural Network Algorithm in Classification of Communication Noise Signals <i>Changren Yu, Lianxing Jia, Yintao Hou</i>	2033
C329	Research on Fuzzy Adaptive Stabilization PID Control System <i>Wenyan Yu,Jun Li ,Kunlin Yang</i>	2037
C331	A new multi-moving object tracking method based on CRC_RLS <i>Wang Jizhou ,Lu Changhua, Jiang Weiwei</i>	2044
C332	Reactive Power Optimization of Distribution Network on Improved Genetic Algorithm <i>Xiaomeng Wu ,Xinyu Guo ,Fei Li ,Achao Zhang</i>	2048
C333	Research on Edge Extraction Technique of the Image Border of Welding Pool Based on Mathematical Morphology <i>Xiaomeng Wu ,Xinyu Liu ,Fei Li ,Hao Yan,Pengbiao Zhang</i>	2053
C334	A Situation Visualization System Based on 2D&3D Electronic Sand Table <i>Qin Li ,Haimin Liu ,Zhenyu Wu</i>	2057
C335	Multi-sensor Detection Network based on Improved Bat Algorithm. <i>Jiahao Xie,Daozhi Wei</i>	2061
C341	Energy Efficiency of CARQ Broadcast Protocol <i>Zufang Dou, Suoping Li , Member, IEEE, Yining Gao, Jinshu Chen</i>	2066
C342	Markov Modeling Methods for Performance Analysis of IEEE 802.11 Protocol <i>Fan Wang, Suoping Li, Member, Zufang Dou, Duo Peng</i>	2071
C343	Delay Analysis of Wireless Body Sensor Network Based on Congestion Control <i>Qianyu Xu, Suoping Li, Member, IEEE, Yongqiang Zhou, Xijuan Yang</i>	2076
C347	Performance Analysis of Frequency Hopping Communication System Based on Simulink <i>Yan Yunbin, HAN Ning, LI Baochen</i>	2081
C348	QBC-Softmax Algorithm for E-nose Data Processing Based on Different Informativeness Evaluations <i>Zhiyi He, Kun Lv, Song Yu, Debo Shi, Jia Yan</i>	2085

C349	Application of Cloud Model and Matter Element Theory in Transformer Fault Diagnosis <i>Tao Wang, Liqun Shang, Xianmin Ma</i>	2089
C350	Reflections on the Construction of Cyber Security Range in Power Information System <i>Zhiyu CHEN, Longchuan YAN, Yongyuan HE, Dongxia BAI, Xiaolin LIU , Limin LI</i>	2093
C351	The Gracefulness of Super Sun-Graphs <i>Jianmin Xie ,Tinggang Zhao , Bing Yao</i>	2098
C352	A Novel Fast Fingerprint Matching Method Based on Feature Descriptors <i>Wenyan Chen, Wenbo Fan, Xiaoli Xi, Zhi Yang, Junyu Yang</i>	2106
C353	Transmission Security Platform for Transportation Information based on BeiDou Navigation Satellite System <i>Liquan Deng , Sipan Ye , Hongyun Qiu</i>	2110
C355	Flash Faults Analysis of Signal Lamp of Circuit Breaker on Affusion Electrical Machinery <i>Xiaomeng Wu ,Xinqiao Li ,Hao Yan ,Xu Feng</i>	2114
C358	Multi Feature Small Sample Object Recognition Method based on DTW Algorithm <i>Ruifang Zhang ,Yangxue Liu</i>	2118
C360	Target recognition of BP network based on Optimized wolf pack algorithm <i>Xiaoyang Gao , Pengcheng Wan</i>	2123
C361	Research on Online Correction of SOC estimation for Power Battery Based on Neural Network <i>Yan Yang, Jun Wang, Haipeng Weng, Jing Hou, Tian Gao</i>	2128
C364	Hardware design of short wave radio based on Software Radio <i>Yuanzhe Xu, Dapeng Tong , Beiqiao Jiang</i>	2133
C365	An Improved Adaptive ET-PHD Algorithm for Newborn Target Intensity <i>Cong Peng , Wenqiang Ye</i>	2137
C368	Research on Parallelization of Logsf Feature Selection Algorithm <i>Aizhang Guo ,Ningning Zhang ,Tao Sun</i>	2143
C374	Base on ETS model for Forecasting Emergency Department Visits <i>Qingyu Zhang,Kang Wang,Hainan Guo,Shimiao Yang,Cui Li</i>	2148
C375	Design of Intelligent Car Steward Controlled by Brain Waves <i>Zhaoye Li,Yi Liu,Feilong Yu,Xinguo Cui,Zhaojun Xue</i>	2152
C376	Design and Optimization for the Main Dimension of Flywheel Motor Based on Torque Density	2156

BU Jianguo , LAN Xudong , ZHOU Ming , LV Kaixiong

- C378 A Frequency-Hopping Communication System Based On Multiple Parallel Hopping** 2163
Zhichao Chao, Xingtao Zhu, Wei He, Yongling Ban, Shaorong Chen
- C380 ISAR Images Segmentation Based on Spatially Variant Mixture Multiscale Autoregressive Model** 2170
Yanwei Ju , Yan Zhang , Feng Guo
- C393 Fingerprint Feature Recognition of Frequency Hopping Based on High Order Cumulant Estimation** 2175
Yinsong Yang ,Ying Guo , Hongguang Li, Ping Sui, Runze Dong
- C396 The FPGA Test Algorithm Of Large Constraint Length Convolution Code Encoder** 2180
Zhang Taotao, Wang Manxi, RONG Hui, Ren Bingyin,Liu Wanhong , Liu Yufeng
- C400 Aviation Flight Security Assurance Evaluation System Based on Panboolean Algebra** 2185
Xinxin Zang, Bin Li, Weiwei Zhu
- C401 An Undeniable Signature Scheme based on Quasi-Dyadic Codes** 2189
Lei Hua, Mu Han, Shidian Ma, Xiaolin Feng
- C402 Application Of Ant Colony Algorithm In Crawler** 2195
YangXin Teng ,MingXuan Li,Ling He ,Jia Chen , Xu Wang,Feng Li,Tao Chen
- C403 Research on Personalized Recommendation of Products based on Concept Similarity of Node Depth** 2199
Fei Shu, Feng Li, ShuTing Chen, Ming Li, XueTao Dong
- C404 Research of Personalized Recommendation Algorithm based on Similarity and Diversity** 2203
Fei Shu, XueTao Dong, ShuTing Chen, Song Qing, MeiHui Hu
- C405 Research and Implementation on User Interest Modeling based on Genetic Algorithm** 2207
Fei Shu, Ming Li, ShuTing Chen, Jia Chen, XueTao Dong
- C406 Algebraic Groups For Construction Of Topological Graphic Passwords In Cryptography** 2211
Bing YAO, Yarong MU, Hui SUN, Xiaohui ZHANG, Hongyu WANG, Jing SU, Fei MA
- C409 Static Voltage Stability Analysis Based on the Combination of Dynamic Continuous Power Flow and Adaptive Chaotic Particle Swarm Optimization** 2217
Bei Cao , Mingming Bo , Jianbing Pan, Yang Liu
- C410 Design of distance measuring and reversing system** 2222
SUN Zhi , YANG Yi , WANG ZHI-sheng

C411	Location Model Based on Population Distribution of Language <i>Yaqun Huang ,Haocong Ying ,Meiling Chen ,Qinyi Yu ,Murong Jiang ,Haiyan Li</i>	2227
C412	Short-term power load forecasting based on Least Squares Support Vector Machine optimized by Bare Bones Fireworks algorithm <i>Caijia Lei, Binghua Fang, Hui Gao, Wei Jia, Wei Pan</i>	2231
C413	Research on auxiliary transportation system of double-electric trolley in mine <i>Liu Yu-rong</i>	2236
C414	Design and implementation of knowledge sharing system based on WeChat small program <i>Xiaoxi Gu , Lingjun Yang , Sanxing Cao</i>	2242
C415	Design of Bipolar Independent Adjustable Pulse of MAO Power System <i>Zhonghu Yuan ,Rengzhi Liu ,Xiaohui Ying</i>	2247
C416	Test point selection based on binary grey wolf optimization algorithm for analog circuit <i>Ping Song ,Yuzhu He</i>	2253
C418	Research on Deployment of Throwing Jamming Microwave Relay Communication <i>Xing Yang</i>	2257
C424	Image segmentation based on Blob analysis and quad-tree algorithm <i>Wen-quan FAN,Wen-shu XIAO</i>	2262
C427	Supervisory Control of On-load Tap-Changing Transformers in Xiamen Bipole VSC-HVDC Transmission Demonstration Project <i>Wujie Chao , Zhijun Tang , Jiansheng Guo, Guodong Lin</i>	2269
C428	Coarse Alignment Technique Based on SVD Method for SINS on Swing Base <i>Jingshuo Xu , Yongjun Wang , Guoheng Xu</i>	2278
C429	The Acquisition Method of BOC Signal Based on Partial Coherent Sideband <i>Rui Feng ,Hong Ma ,Yufei Ren</i>	2282
C431	Vortex Induced Vibration Analysis of 500kV Single-Core Optical Fiber Composed Submarine Power Cable Based On Finite Element Method <i>Xiaoyao Huang ,Zhenpeng Zhang ,Shaohua Wang ,Chang Wang ,Jiankang Zhao ,Qifeng Bian ,Anqiang Lv</i>	2287
C432	Parametric Modeling of Geometric Errors for CNC Machine Tools Based On Chebyshev Polynomial <i>Jianfeng Lin ,Yanqiang Zhang ,Xuxu Zhang ,Weiwei Li ,Weiqing Lin</i>	2293
C434	Study of Sierpinski Gasket Used in Gray Image Scrambling <i>Lingyu Chen , Guomin Song , Xiaohui Meng</i>	2298

C435	An quantifiable Attack-Defense Trees model for APT attack <i>Yu Fei ,Jing Ning ,Wenbao Jiang</i>	2303
C436	Visualizing IED Interaction in Smart Substation <i>Yong Wan, Ming Cai, Di Zhou, ZizhanWang</i>	2307
C437	Control of thermal fractal diffusion of cylinder wall <i>Changxu Shao ,Shutang Liu</i>	2312
C439	Design and implementation of handwritten digit recognition system based on template method <i>Yang Zhiqi, Fu Kai</i>	2316
C440	The Development and Key Technologies of Smart Distribution Network Planning Converging High Penetration Level of EVs <i>Jinglin Han, Shiyao Hu, Hua Shao, Jiakun An, Yang Yang, Guangxin Zhai , Xuefei Liu</i>	2320
C441	Composite attitude control for flexible spacecrafts with input saturation <i>Hua Liu , Yumin Zhang , Chonggang Ren</i>	2325
C442	Modularization Design of Inspection Robot Based on Substation <i>Wei Xu, Shangwei Yang, Shiyou Mu, Rui Huang, Jianxiang Li , Haipeng Wang</i>	2330
C443	An Improved Certificateless Aggregate Signature Scheme for Vehicular Ad-Hoc Networks <i>Xiaodong Yang, Chunlin Chen, Tingchun Ma, Yutong Li, Caifen Wang</i>	2334
C444	Space Information Support Warfare Model Based on Metcalf-Lanchester's Equation <i>Xiangyu LIU,Haiyang JIANG, Hongli ZHAO,Haitao YANG</i>	2339
C445	Astronomical Data Application Research Based On MapReduce <i>Qingfa Cui ,Sheng Wu</i>	2345
C446	Research on Intelligent Hoisting System of Warehouse Based on Similarity-Contrast Method <i>Yuting Fu, Di Dai, Lei Ma, Xun Liu, Ying Huang</i>	2349
C454	A Bibliometric Analysis of Cloud Computing Technology Research <i>Junfeng Yu, Zijiang Yang, Shiwei Zhu,Beibei Xu,Sisi Li, Mingjun Zhang</i>	2353
C456	Research on Response Surface Method of Support Vector Machine based on Markov Chain <i>Jiadong Qiao, Sen Li, Tong Zhang</i>	2359
C457	Metal surface defect detection based on MATLAB <i>Zhipeng Li ,Jun Zhang ,Tao Zhuang ,Qiuyue Wang</i>	2365

C461	On Simultaneous AUV Localization with Single Acoustic Beacon using Angles Measurements <i>LI Jia-tong, ZHANG Chen, ZHANG Hong-xin</i>	2372
C462	Dynamic Allocation of Spares Quota in Converter Station Based on Least Square Method <i>Di Dai, Jing Tan, Yuting Fu, Yanwen Wang, Chenglong He</i>	2379
C465	Target Clustering Algorithm Based on Similarity Matrix in Radar Detection <i>Liyang Zhan, Yu Tao, Xuping Jiang</i>	2383
C469	Analysis of Abnormal Discharge of 220kV Transformer <i>Liu Hong, Liang Jizhong, Wang Wei, Guo Ruizhou</i>	2388
C470	Measurement of Capacitance Current of Neutral Point Non - grounding System <i>Liu Hong, Yu Hua, Niu Shu, Guo Ruizhou</i>	2393
C471	Active Disturbance Rejection Control Based on Radial Basis Function Neural Network <i>Xiangdong Huang, Qingzhao Ning</i>	2397
C472	Aero-Engine Guide Vane Angle Regulator Iterative Learning Control Method <i>Yong Li, ZHenghe Wang</i>	2401
C473	Research on new method of path detection for new type power communication optical cable <i>Yuan ZHI, Geng Yin, Bo Li</i>	2406
C474	Recognition Algorithm of Emitter Signals Based on PCA+CNN <i>Wenqiang Ye, Cong Peng</i>	2410
C475	Analysis of GPS Interference Effect of Ground Tracking Station During the Syrian airstrike <i>Kun Zhang, Fang-ling Zeng, Xiao-feng Ouyang, Yuan Zhao</i>	2415
C476	Research on risk assessment technology of industrial control system based on attack graph <i>Zhenwan Zou, Di Wang, Huiting Yang, Yingsa Hou, Yandong Yang, Wenlu Xu</i>	2420
C477	A new semi-quantum key distribution protocol with high efficiency <i>Wei Liu, Huaijun Zhou</i>	2424
C478	An improved fast self-healing feeder automation system <i>LI Ya-ning</i>	2428

C479	Electronic Table Card Based on Full Color LED Screen	2433
	<i>Kai Zhang , Yiran Wang , Kun Li , Jingwei Liu , Mingyin Xu , Qing Liu</i>	
C481	Battery Equalization Circuit with Share Bus for Electric Vehicle Applications	2437
	<i>Xiangyu Wang,Dangdang Zhou ,Qing Liu,Zhuang Sun, Kun Li</i>	
C482	Primary Frequency Regulation Control of Wind Turbines Based on Variable Power Tracking	2443
	<i>Yuzhi Chen ,Jiangbin Zhang,Xi Chen</i>	
C484	An Active Equalization Circuit Based on the Share Bus for series Li-Ion Battery	2450
	<i>Xin Liu,Kun Li,Zhuang Sun,Qing Liu</i>	
C486	Research on Customer Attention of Online Short-term Rental Platform	2455
	<i>Nan Meng , Xiaomin Xu</i>	
C490	Research on Eliminating Abnormal Big Data based on PSO-SVM	2460
	<i>Haiting Cui</i>	
C491	Moving Horizon Estimation and Attitude Optimization Algorithm for MEMS Gyroscope Array	2464
	<i>Zeng Lijun, Min Fang</i>	
C493	A High Linearity Wideband LNA with an Excellent Gain Flatness for S-band Application	2469
	<i>Haiou Li,Chencheng Li,Yue Li,Jin Zhuo, Qi Li, Fabi Zhang, Tangyou Sun, Yong Cai, Zhiqun Chen, Gongli Xiao, Tao Fu, Xi Gao, Jianghui Zhai, Yonghe Chen</i>	
C494	Coupling Analysis of AC Motors Based on Relative Gain Array	2473
	<i>Biao Wang ,Qingchuan Zhu ,Huan Zang ,Shuang Kou , Ji Ke</i>	
C495	Intelligence Compatibility Test of Web Services-based Power Business	2477
	<i>Zhiyu CHEN, TIANLIANG PENG, SHAOYAN GONG, Limin LI, Longchuan YAN , HAO HAN</i>	
C498	The Exploration of the Stress with a Width Crack on Semi-infinite Plane Boundary	2482
	<i>CaixiaFu, XiaochunYang, LeiWang</i>	
C499	Supernetwork-Based Invulnerability Evaluation of Topology for Wireless Communication Network	2487
	<i>Ye Libang, Pan Lifu, Li Chao</i>	
C500	A New Modeling Method for Production Loss during the Warming in Serial Bernoulli Production Systems*	2491
	<i>Yukan Hou , Yuan Li , Jie Zhang, Shoushan Jiang</i>	
C501	A Study on Moving Object Detection Algorithm	2495

C505	Co-simulation on Performance Evaluation of a New Electronic Control Hydraulic Braking System <i>Chao Li, Chengkun He, Ye Yuan, Junzhi Zhang</i>	2500
C506	Joint Delay and Angle Estimation Algorithm with Low-Complexity in Multipath Environments <i>Haiwen Li, Chunqi Jiang, Song Chen, Jingzhi Zhang , Haiwen Li</i>	2505
C512	Research on Software Simulation Technology of New Generation Smart Substation Secondary System <i>Chao Li ,Wujie Chao ,Shaozhen Lin ,Jiansheng Guo ,Wenwang Hu ,Zhijun Tang</i>	2510
C513	Grid Current Control of Microgrid with Cascaded Micro Source Inverters Based on Dynamic Phasors Model <i>Xingguai Wang, Jinjing Zhang, Weiman Yang</i>	2514
C515	Hyperbolic-weighted centroid Indoor Location Algorithm based on Kalman Filter <i>Xiaoquan Zhang, Wei Lin</i>	2520
C516	Application of Improved Quantum Genetic Algorithm in Fault Location of Distribution Network <i>Xuhai Wang ,Xiangyang Yu ,Yuan Xue ,Yong Zhu ,Jianing Fu</i>	2524
C517	Application of UKF Alorithm in Passive Localization and Tracking <i>Li Bingrong, Qu Changwen, Zhou Zheng, Guo Linpeng</i>	2530
C518	Design of Test Data Management System for Vehicle Powertrain Integrated Test <i>Xu Baorong, Wu Haoyang, Wang Kai, Zhong XiaoYu</i>	2535
C519	Research and Realization of Nginx-based Dynamic Feedback Load Balancing Algorithm <i>Zepeng Wen, Gongliang Li, Guanghong Yang</i>	2541
C520	Application of a Microwave Mass Flow Meter in a Dense Phase Pneumatic Conveying System of Pulverized Coal <i>Zhongshan Guo, Guomin Zhang</i>	2547
C521	Reconstructing the problem of galloping monitoring of traditional complex analytical mechanism into a prediction method for machine learning algorithm modeling <i>YongFeng Cheng, Jingshan Han,Jing Zhang , Wei Hao</i>	2552
C523	Analysis and research on no-load current and low-side entrance capacitor of transformer <i>Ruizhou Guo, Fan Hu, Hong Liu, Wei Wang</i>	2558

C524	Design of a Underactuated Robotic Hand with Three Articulated Fingers	2562
	<i>Xuelin Wang, Yongguo Zhao, Yongfei Xiao, Yunhai Zhu, Yali Wang</i>	
C526	Research on Thermal Fault Detection Technology of Power Equipment based on Infrared Image Analysis	2567
	<i>LU Zhu-mao, LIU Qing, Jin Tao, LIU Yong-xin, HAN Yu, BAI Yang</i>	
C528	Gesture Interaction and Augmented Reality based Hand Rehabilitation Supplementary System	2572
	<i>Yanxue Xue, Linxue Zhao , Meng Xue , Jingjing Fu</i>	
C529	Dynamical Modeling of Chain Pipeline Robot Passing Through Elbow	2577
	<i>Jun Chen, Xuxu Zhang, Jianfeng Lin</i>	
C530	Design of robot control system for minimally invasive surgery of knee joint	2583
	<i>Haiming Shen</i>	
C531	A Radar Target Tracking Method based on Coordinate Transformation KF	2587
	<i>Liang Jianxing, Chen Qingliang , Bu Defeng, Zhang Xu , Wang Yanting</i>	
C534	Application of Dark Channel Prior Principle to License Plate Detection in Foggy Weather	2591
	<i>Weiwei Zhu, Li Yang, Xinxin Zang</i>	
C536	Recurrent Neural Network for MIDI Music Emotion Classification	2596
	<i>Wei Zhao, Yinan Zhou, Yun Tie, Yushu Zhao</i>	
C539	Big Data Analysis Model of Power Customer Satisfaction Based on ANP	2601
	<i>Xue Li, Shaobing Yang</i>	
C540	Analysis of Complaints in Power Services based on Grey Relational Analysis and Boston Matrix	2607
	<i>Chen Meng, Shaobing Yang</i>	
C541	Research on Outlet Schemes of Indoor Substations Based on AHP	2612
	<i>Jianbo Yu, Ran Ren, Junli Chen</i>	
C542	A Control Flow Integrity Checking Technique Based on Hardware Support	2617
	<i>Yang Li, Zibin Dai, Junwei Li</i>	
C543	Implementation of power monitoring data cloud platform based on Hadoop	2622
	<i>Jingyi Du, Qiong Huang</i>	
C544	Study on an Exact Equivalent Model of DPFC	2626
	<i>Meng Wu , Aihong Tang , Zengbao Wang , Xu Zheng , Qiushi Xu</i>	