

Table of Contents

Preface and Organizing Committee

Chapter 1: Applied Mechanics and Engineering

The Method of Tension Control with Gravity Balance H.R. Chen and Y.Y. Yao	3
True Stress and Shakedown Analysis of Pressure Vessel which under Cyclic Loading to Plastic Deformation X.L. Jia, Y.L. Zhang, J. Wang and C.B. Wang	8
Analysis of the Effects of Fiber Gradient Distribution on the Mechanical Properties of Moso Bamboo K. Chen and L.C. Long	13
Mechanical Properties of Tetrazole Polymers R.A. Castro and E.N. Lushin	19
Studies on Inertial Effect of Transmission Device Components Y.H. Wang	23
The Vibration Based on Non-Zero Point Force Moment Elasticity Theory W.B. Han, S.H. Huang, J. Liu and J.K. Sun	27
Fatigue Analysis Based on the Non-Zero Point Force Moment Elasticity Theory S.H. Huang, W.B. Han, Z.R. Zeng and Q. Luo	32
Numerical Simulation of Dynamic Response of Planing Craft Sailing in Calm Water Y.M. Su, Y.H. Li and H.L. Shen	37
Calculation of Effect of Viscous and Pressure Forces on Trimming Moments S. Sherbaz and W.Y. Duan	42
Develop a Magnetic Pendulum to Scavenge Human Kinetic Energy from Arm Motion J.H. Li, M.J. Cai and L.H. Xie	48
Effect of Leading Edge Geometry on Boundary Layer Transition-An Experimental Approach D. Bhatia, G.J. Yang, J. Sun and J. Wang	53
Effective Mechanical Behavior of Sandwich Beams under Uncoupled Bending and Torsion Loadings H.M. Silva and J.F.B. de Meireles	58
The Effect of Stress Wave on Dynamic Response of Square Thin-Walled Tube Z.H. Tan, B. Zhang and P.C. Zhai	63
Wind-Induced Response of ADSS during the Passage of High-Speed Train Y. Wang, Q. Gao and H.L. Wang	69
Influence of Back Support on the Sagittal Plane Biodynamic Response of Seated Human under Vertical Vibration F. Yang and S. Rakheja	74
Microstructure and Mechanical Properties of (TiAlZrNb) N Films J. Zhang, J. Zhang and W. Zhao	86
The Investigation of Turbulence Models Based on Numerical Simulation R. Li and C.H. Tang	91
Research on Hole Making Mechanism of High Pressure Hydraulic Perforation H.C. Li, X.J. Zhang and F.M. Liang	96
Review on the Research of Orifice Plate Hydraulic Characteristics J.H. Wang and W.Z. Ai	101
Numerical Simulation Analyses on Thick Wall Pipe with Radial Cracks Using Circumferential Lamb Wave X. Dai, C. Lu and G. Chen	105
Thermodynamic Analysis of R410A Refrigeration Cycle with a Two-Phase Ejector J.C. Hu, Y.Y. Liang and J.P. Chen	110

Three-Dimensional Wind-Induced Vibration Control Using MTMD Based on Energy Balance Theory S.L. Lu, J.F. Fu and J.L. Zhang	116
The Coupling Characteristic of HSK Tool-Holder/Spindle Interface for High-Speed NC Machine Tool W.K. Jie, J. Chen, D.S. Zheng and G.C. Wang	121
Self-Calibration of XY-Stage with Parallel Mechanism R. Furutani, S. Yokouchi and M. Ozaki	126
Analysis on Strength of the Frame of a Mine Dump Truck J.F. Zhang and L. Deng	130
Numerical Simulation of Vehicle Crashes C.S. Lin, K.D. Chou and C.C. Yu	135
The Dynamic Loadings of the Solar Panel Mounted on Flat Roof-Top of Buildings by Wind Effects J.H. Chen	144
Research on Evaluation of Vibration Isolation Efficiency Based on Power Flow Analysis X.T. Weng, R. Huo, S.Y. Li and C.P. Liu	149
A Stability Analysis of Roll Curved Conveyer Line Y. Tang and T. Wu	155
Computational Simulation of Multi-Product Flow in an Oil Transportation Pipeline S. Gao and C. Dennar	161
Master-Slave-Parallel Chaotic Synchronization in Class-C Lasers by Controlling the Pump S.L. Yan	166
Application of Horizontal well Multiphase Steady State Flow Model to Evaluate Water Control Effect of ICD Y.F. Liu, Y.G. Duan, J. Dai, C. Zhang and X.M. Zhou	171

Chapter 2: Advances in Materials Sciences and Processing Technologies

Effect of B Refinement on Structure and Fracture Morphology of Al-7 wt.% Si Alloy X.S. Li, A.H. Cai and J.J. Zeng	181
Influence of Heat Treatment on Properties of 2219AA-T6 FSW Joints C.H. Luo, W.P. Peng, T. Chen and F.B. Dong	187
A Study on Cutting Glass Fibers by CO₂ Laser W.H. Wu, C.L. Chang and C.H. Hwang	192
Three-Dimensional Ultrafast Laser Micromachining of Silicon for Microsystems M. Babiy, F. Bystrov, Y. Biryukova and S. Golik	197
Effects of Cu-Zn-Ni Electrode during EDM of SUS 304 Material P. Janmanee, S. Chuvaree and K. Jamkamon	202
Enhancing the Piezoresistance Sensitivity and Repeatability of Carbon Nanotube/Silicone Nanocomposites X.X. Zhang and L. Ba	207
Facile and Effective Purification of Arc-Discharged Single-Walled Carbon Nanotubes by Centrifugation S. Xiu, M. Lang, J.L. Gao and Y.F. Lian	211
Preparation and Properties of Y and Sb Doped SnO₂ Conductive Powders X.Z. Liu, G.J. Song, X.Z. Liu, J. Chen and Y. Wu	216
Preparation and Properties of Eu, Sb Doped SnO₂ and Quartz Compound Conductive Powders X.Z. Liu, W.W. Zhu, X.Z. Liu, J. Chen and Y. Wu	220
Electrostatic Interaction between Dissimilarly Charged Membranes in Salt-Free Solution S.H. Chang	224
Effect of Oxygen Partial Pressure on Electrical Characteristics of Amorphous Zinc-Tin-Oxide Thin-Film Transistors S.P. Chang	229
Analysis of CuO-Water Nanofluid Application on Heat Pipe N. Putra, W.N. Septiadi and R. Sahmura	234

Alloy Inconel 718 by 3D Micro-Electro Discharge Machining P. Kumkoon, C. Raksiri and C. Jansuwan	239
Deep Hole of AISI P20 Mold Steel Material by Electrical Discharge Machining K. Jamkamon and P. Janmanee	244
Research on Joint Strength of Aluminum Alloy Welded by FSW C.H. Luo, T. Chen and W.P. Peng	249
Study of Preparation Technology and Properties of Silver Based Electric Brush Materials J.Q. Hu, M. Xie, J.M. Zhang, M.M. Liu, Y.T. Chen and Y.C. Yang	254
Experimental Study on Dispersion and Explosion Process of Fuel-Air Mixture in Underground Fuel Depot D. Wang, Y. Du, X.S. Jiang, J.J. Liang and J.Z. Zhou	261
Visualization Study of Dust Dispersion Process in Siwek 20-L Device for Dust Explosion Test B. Du, W.X. Huang, N.S. Kuai, J.J. Yuan, L. Liu, Y.D. Ren and Y. Gan	266
Effects of Technological Conditions and Substrate Material on TD Coatings Y.J. Zhang, H. Chen, Z.Y. Gao, S.N. Li, H.M. Yu, W. Xu and L.N. Yu	271
Investigation Colorized Property and Construct of Functional Devices for Electrochromic Coating Film T.L. Chuang, Y.J. Gao, C.Y. Hua and H.T. Huang	276
Prediction of Thermal Gradient in Traverse Cylindrical Grind-Hardening H. Li, J.F. Zou and G.C. Wang	280
Maleic Anhydride Grafted Modified PA6 as Compatilizer Preparation of PLA/PA6 Blend H.X. Wu, S.Q. Jiang, H.R. Cui and J.Y. Cui	284
AHSS Auto Structural Metal Stampings: Crucial Role of Lubricant N. Baluch, N. Norani and S. Mohtar	289
Effect of Machining Parameters and Wear Mechanism in Milling Mold Steel AISI-P20 and AISI-1050 P. Janmanee, S. Wonthaisong and D. Araganont	294
Analysis of Feed-Direction Burr Formation in Micro-Turning J.G. Huang, J. Huang, C. Yang and G.C. Wang	299

Chapter 3: Construction, Building Materials and Structural

Influence on Pitting Corrosion Behavior of Welded AISI30400 Plate in a Freeze-Thaw Environment T. Takahashi, Y. Iwabuchi, K. Ishitsuka and K. Murakami	307
Finite Element Analysis of Dry Shrinkage of Fiber Cement Mortar W.H. Xuan, P.X. Wang, Y.Z. Chen and X.H. Chen	312
Experimental Research on Flexural Behavior of Precast Thin-Wall Steel and Spun Concrete Composite Pile X.Q. Wang, S.M. Zhang, J. Liao, Y.S. Huang and C.L. Wang	316
Two-Run Genetic Programming for Predicting Slump Flow of Concrete L. Chen, C.H. Kou, K.T. Chen and S.W. Ma	321
Working Mechanism of Two-Phase Varying Stiffness Piled Raft Foundation Y. Huang, X.J. Feng, J.L. Zhang and S.Z. Lin	326
Static Loading Tests of New Type of Bolt Assembly Connection Developed for Perspective Temporary Steel Railway Bridges M. Karmazínová and M. Štrba	331
Research on Horizontal Bearing Capacity of Precast Thin-Wall Steel and Spun Concrete Composite Pile X.Q. Wang, S.M. Zhang, J. Liao, Y.S. Huang and H. Liu	336
Comparative Study between Field Measurement and Wind Tunnel Test of Wind Pressure on Wuhan International Stock Building S.G. Liang, X.H. Peng and L. Wang	341
The Scope of Round-Pier's Suction Effects Q. Chen, W.Z. Ai and J.H. Wang	349
Simulation Study about Impact of Building Density on Heat Island Effect X.Y. Luo, J. Ge and Y. Zhang	353

Mechanical Characteristics of Three-Truss Plate-Truss Composite Bridges on High-Speed Railways	
Y.Q. Han and M.X. Ye	358
Experimental Verification of Glass-Fibre-Concrete Covers of Footbridge Deck Cornice, Subjected to Wind Loading Actions	
M. Karmazínová, J. Melcher and M. Štrba	363

Chapter 4: Advances in Mechatronics, Robotics and Automation

A Preliminary Study of the Dynamic and Control of the Solar Sail	
X.C.M. Cubillos and R.C. Drebes	371
An Implementation of Energy Saving Control Systems with Contactless Programmable and PWM Scheme	
J.L.Z. Chen and Y.C. Hsu	376
Neural Network Adaptive Control of Free Floating Space Robot with Actuator Saturation	
G.L. Zhang, T. Lei, F. Yang and Z. Cai	380
Safety Driving Decision-Making of the Advanced Vehicle Control and Safety System	
X.C. Guo	386
Fault Diagnosis for Diesel Engine Cylinder Head Based on Genetic-SVM Classifier	
X.L. Zhang and Y.J. Xu	390
Analysis of the Lateral Stability for Four-Wheel Independent Driving Electric Vehicles	
L. Zheng and J. Ye	394
LQR+PID Control and Implementation of Two-Wheeled Self-Balancing Robot	
B.G. Zheng, Y.B. Huang and C.Y. Qiu	399
Docking System and Power Management for Autonomous Mobile Robots	
A.C. Acosta Calderon, B.S. Ng, E.R. Mohan and H.K. Ng	407
Adaptive Method to Trajectory Tracking for Lane Changing	
D.B. Ren, G.Z. Zhang and C. Wang	413
The Research for Data Acquisition Technology in High-Speed Cutting Database	
Y. Zhang and X.J. Guo	418
A Deformable Spherical Mobile Robot	
Q. Zhan and Z.N. Liu	422
The Optimal Design of Fuel Cell Bus Power Train	
H. Shi, F.C. Jiang, Q. Zhang and S.N. Song	427
The Design of Inertial Tracking System Based upon MEMS Sensor	
K. Liu, K. Qian and H. Che	432
Research on Vehicle Rollover Warning System	
Y.H. Chen, J.K. Xu, J.G. Mao and Z.L. Jin	437
Embedded Technology Parameter Scheduling Optimization Expert System on the Plastic Extruder Applications in Production	
Y. Li and Y. Wang	442
Impact of Electric Vehicle Lateral Dynamics on the Battery Pack	
S.N. Song, F.C. Jiang and H. Shi	451
Artificial Neural Networks Applied to Bandsawing Process Control	
W. Gehring Junior, F.H.A. Vieira, C. Affonso, M.C.d.S. Alves and M.T. Gonçalves	458
Point Cloud Feature Extraction Based Integrated Positioning Method for Unmanned Vehicle	
Y. Ma, Z.C. Wei and Y. Wang	463
An Active Loop Closure Fast SLAM Method Base on Topology – Section Lines Cascading Map	
G.L. Zhang, J. Xu, Y.J. Sun and E.L. Yao	470
Disturbance Rejection for Discrete-Time Linear Systems with Time-Delays via Internal Model Principle	
S.T. Ge, Z.M. Liu, X.X. Gao, M.X. Wang and Y.Q. Feng	478

Chapter 5: Advances in Electrical and Power Engineering

Study on DC Bias Vibration Signal Separation and Experiment of Transformer Based on FAST-ICA Algorithm	
Y.M. Yang, X.M. Liu and X. Duan	485
Application of GWS-1 Remote Equipment in the UHVDC Projects	
F.L. Li, W.W. Jin, K.W. Pang, L. Zhang, R. Zhang and Y.H. Shen	490
Comparative Study on Low Voltage Ride-Through Test Methods for Grid-Connected Photovoltaic Inverter	
W.J. Wu, J.H. Su and H.N. Wang	495
Research and Investigation of the BCM Design for PFC Boost Converters	
Q.M. Wan, D.G. Liu and G.X. Zhou	500
Initial Charging Current and SOC Strategy about Battery Based on Fuzzy Logic	
L.Q. Chen, X. Han and B. Li	506
Optimal Virtual Power Plant Dispatching Approach	
Y.C. Chang, S.L. Chen, R.F. Chang and C.N. Lu	511
The Operation Dispatch of Cogeneration Systems in the Deregulation Environment	
M.T. Tsai	516
The Locating and Sizing of Distribution Generation Based on the Distribution Network	
X.Q. Lu, Y.N. Xue, X.D. Mi and X.H. Du	521

Chapter 6: Advances in Design Technologies

Development of a Treadmill Platform for Dynamic Training with Vibratory Stimuli	
F.C. Amate, O. Cassiano and F.R.M. Basile	529
Analysis and Collision Simulation Research of the Latest Underrun Protective Device	
J.F. Xie and Y.Q. Cheng	534
Sensitivity Analysis of Flexible Pavement Parameters by Mechanistic-Empirical Design Guide	
X.Y. Li, R. Zhang, X. Zhao and H.N. Wang	539
Analysis of the Impact of Specific Heat Ratio on Two-Dimensional Low Mach Number Nozzle Design	
Z.Q. Fan, H.B. Yang, F. Zhao, R. Zhu and D.B. Sun	546
Design of a Robot Applied to Inspection of Power Transmission Lines	
A. Mahouin and R.S. Gonçalves	551
Research on the Design Method of Intelligent Interaction in Industrial Design	
Y. Gan and J.Q. Wang	556
A Wheelchair Design for Topple Prevention	
C.W. Chen and D.C. Cai	561
A Wheelchair Design for the Elderly with Small Strength	
D.C. Cai	566
An Apparatus Design to Assist Standing Up from Sitting	
D.C. Cai	571
Shaft Design Check with AutoCAD-Mechanical	
F.W. He	576
Design and Development of Beverage Maker	
D.C. Cai, J.F. Chen and Y.W. Chang	581
Research on the Rapid Slicing Algorithm Based on Triangle Facets Ring	
H.Q. Yang, G.J. Liu and T. Wang	586
The Approachment for Developing a CAD System for Cam Mechanisms of ATC	
X.L. Qiu and G. Sun	591

Chapter 7: Measurements, Testing and Monitoring

Air-to-Water Heat Pump Monitoring in the Cold Climate Region	
T.A. Koiv, M. Ling and K. Tennokese	599
A Novel Wireless Passive SAW Temperature Sensor Structure Design and Simulation	
T.L. Li, J. Wang, G. Xu and L.C. Fang	604

To Explore the UAV Application in Disaster Prevention and Reduction W. Zhang and J. Wu	609
Experimental Study on Counter Current Flow Limitation Based on Variation of Gap Size in Narrow Rectangular Channel during Quenching Process M. Juarsa, N. Putra, Harinaldi and A.R. Antariksawan	613
Vision Based Measurement of Refueling Droque for Autonomous Aerial Refueling X.F. Wang, X.M. Dong, X.W. Kong and J.H. Zhi	618
Digital Moiré Phase-Shifting Interferometric Technique for Aspheric Testing Q. Hao, Y. Hu and Q.D. Zhu	623
A Permittivity Measurement Method Based on Cavity Perturbation Technique Q. Chen, Y. Yang, K.M. Huang, C. Chen and K.Y. Wang	629
Refractive Index Sensor Based on Photonic Crystal Fiber Coated with Silver Film M.T. Wang, Y. Lu, C.J. Hao and J.Q. Yao	634
Simulation of Non-Destructive Testing on Weld Surface Crack of Metal Structure by Electromagnetically Stimulated Infrared Thermography Z.P. Liu, H.L. Liu, L. Jiang and G. Lu	639
On-Line Monitoring of Drill Wear Using Air-Coupled Audio Microphone when Drilling Composite Materials E.D. Eneyew and M. Ramulu	645
Experimental Study of Methane Sensor Based on the Principle of Infrared Detection Y.C. Li, Y.Z. Liang, X.S. Ma and W.P. Jia	651
Identification of the Content of Ganoderma Lucidum Powder in Ganoderma Lucidum Spore Powder Based on Near-Infrared Spectroscopy and Partial Least Squares X.T. Li, L.Y. Xia, P.Y. Chen and Y.P. Pang	656
3D Reconstruction for Underwater Target Based on Linear Structured Light H.R. Cui, C.F. Guo and S.L. Lan	660

Chapter 8: Computational Methods and Algorithms, Communication and Applied Information Technologies

Application of Neuro-Fuzzy Inference System on Wood Identification F.H.A. Vieira, C. Affonso and M.C.d.S. Alves	667
A New Method for Computing Eigenpairs of a Finite Element Structure P. Liang, Y.H. Zhang, J. Wei and B. Yu	672
An Improved Particle Filter SLAM Algorithm in Similar Environments G.L. Zhang, E.L. Yao, W.J. Tang and J. Xu	677
Application of Radial Basis Function Neural Network for Carbon Price Forecasting M.T. Tsai and Y.T. Kuo	683
Affinity Propagation Clustering Algorithm Based on PCA B. Chen and K. Song	688
Combining Expert Strategies in Multimodal Classification J. Peng	693
Using Term-Based Partitioning Framework on MongoDB and Elastic Search H.J. Pyo, H. Jeong, N.J. Kim and E.I. Choi	698
An Efficient Adaptive Wolf Pack Search Algorithm W.H. Han, X.H. Shen, J. Xu, P. Yang, X.H. Yang and G.D.X. He	702
Comparative Study on Zero Forcing Block Linear Equalization for TD-SCDMA Y.D. Sun, T.L. Fan and S.B. Huang	710
Improved Low-Rank Matrix Approximation for Hyperspectral Image Spatial-Spectral Feature Extraction Q. Zhang, Y.P. Yang and X.W. Jiang	716
Comparative Analysis of the Status of the Network Protocol Reverse Engineering H.Q. Tao, F. Jia and Y. Wang	722
The Research of Speech Recognition in Low SNR Based on GA-SVM Y.Q. Wang and H. Zhang	727
Compare SM Solver, ANSYS Soft Ware to Analyze Structural Internal Force Bars L.J. Cheng and X.C. Yan	732

Adaptive Image Generalized Fuzzy Enhancement and Quality Evaluation F.Y. Cui and L.L. Ma	736
Study on Alcohol Testing Modeling and Design of Trusted Driving Safety Control System Based on IOT P. Wang, Y. Jiang, X.C. Zhou and H. Yang	741
Validity Analysis of Finger Vein Application in Identity Authentication D.S. Yin and X.D. Zhang	746
Security Framework Using Forensic Function and Log Management N.J. Kim, H. Jeong, H.J. Pyo and E.I. Choi	752
Community Structure Analysis in Social Network of Sina Weibo S.W. Xu, X. Zhang and Z.Y. Xia	756
Fault Diagnosis and Reliability Growth for Information System Z.H. Huang	763
Optimal Policies for a K-Phase Service System with Bernoulli Vacation Schedule C.C. Kuo and J.C. Ke	768
Application of Targeted Consistency-Adjusting Method in Group Decision-Making Q.M. Liao, C. Wang, Y. Wang and S. Huang	773
Research on Individuation Task Allocating Based on Team Collaboration L. Gong, X.D. Zhang, B.T. Fan, Z.J. Zhang and Y. Xiao	778
Image Trading Mechanism Based on Hybrid Watermarking Techniques F.H. Yeh, G.C. Lee, C.H. Liao and S.C. Wang	784
A Novel Non-Uniform BTC and its Application Y. Wei and K.T. U	789
Some Properties of (Inverse)N_0-Matrices with its Applications C.S. Yang, H.B. Wang and Y.F. Jiang	795
Probabilistic Teleportation via a Partially Entangled GHZ State being Known by only the Sender L.X. Xia, R.Q. Liu and W. Zheng	799

Chapter 9: Biomedical Engineering

A Novel Parameter Estimation Method for Drug Diffusion, Distribution and Clearance in the Rat Brain Extracellular Space K. Li, L. Zuo, D.Q. He and H.B. Han	805
Free Software for the Detection of Structures in Breast Images R. Campello de Magalhães, S.C.M. Rodrigues, M.A.B. da Silva, L.T. Kawamoto and A.P. da Silva	814
The Effect of Bioprosthetic Heart Valve with Different Suture Densities X. Zhang, Q. Yuan and X. Huang	819
Advisory Software for Improving the Prevention of Dentistry Medical Conditions Arising from Chronic Diseases P. Ramirez, L.T. Kawamoto, A.F.F. Slaets and F.C. Amate	823
Impairments of Working Memory for Object-Location Associations in Depression P.F. Liu, M. Li, S.F. Lu, J. Wang, Y. Zhou, X.Y. Su and N. Zhong	828
The Approach for Dose-Effect Relationship of TCM Research Based the Overall Effect of Metabonomics Q.Y. Zhang, J. Li, B.T. Li, J.J. Fu, R.Y. Yu and G.L. Xu	833
Military Parachuting Injuries among Male and Female Cadet Pilots: A Prospective Study of 59,932 Jumps W.J. Guo, X.S. Liu, Y.R. Chen and J.Q. Zhou	837

Chapter 10: Engineering Management and Technologies in Education

A Life Cycle Impacts Assessment of the Differences between the LNG Cement Mixer Truck and its Diesel Counterpart R.S. Yin, Y.P. Yang, J.Q. Xu, Y.S. Chen and X.Y. Tu	845
--	-----

The Measurement of Technology Innovation Spillover Effect between Sections: A Case Study of Tangshan B.Z. Li	851
Optimizing Chinese Motorized Transportation Modes to Support Cross-River Public Activities C.X. Yang and Y.K. Hu	856
Analysis on the College Campus of Road Traffic Safety in China Q. Chen, Y. Zhou, D.D. Bai and M.Y. Zhang	862
Optimization of the Automobile Parts Mixed Production Line Based on EM-Plant Z.Y. Lin, W.Y. Shi and W. Zhang	867
Reliability Analysis and Prediction of Metro Vehicles' Bogie Frame Y. Qin, Z.Y. Zhang and J.X. Shi	872
Characterization of the Specific Electrical Energy Consumption of Agrifood Industries in the Central Region of Portugal P.D. Gaspar, P.D. Silva, J. Nunes and L.P. Andrade	878
Staged Cost Influence Factors Analysis on Power Transmission Project X.Y. Yu, L. Liang, M. Yu, F. Wang and Z.Y. Song	883
Correlation Analysis and Control Scheme Research on PM2.5 T. Liu, M.P. Wu, K.D. Zhang, Y. Liu and J. Zhong	888
The Influence of FDI on the Market Structure of the Port Industry R. Wu and M. Tu	895
Research on Social Profitability Threshold of China Intercity Railway Based on Passenger Demand T.T. Gan, K.Q. Wu and J.M. Tang	901
An Exploration of Success Factors for the Comprehensive Construction of a Shopping Area from the Consumer Point of View — A Case Study of the Business Area of Sanyi, Miaoli M.Y. Ku, K.H. Lo and W.T. Lin	906
Study on Modeling for Comprehensive Quality of Music Graduate Students Evaluation System H.M. Cao, M.T. Cui and L.M. Jia	911
Computer Aided Design of Chinese College English Teaching Materials Based on COCA Corpus Y.J. Huo	916
Real Physical Model Marking Digital Control Experiments Y. Yu, Y. Wang, M. Chen and X.Y. Zhang	920