

Energy Efficiency in Strategy of Sustainable Production

Eds. Jörg Franke and Sven Kreitlein

Selected, peer reviewed papers from the 2nd Green Factory Bavaria Colloquium 2015, September 30 - October 1, 2015, Nuremberg, Germany

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Keyword: Energy Efficiency, Energy Management, Energy Measurement, Energy Efficient Production Strategies, Energy Efficient Production Processes

Summary: Collection of selected, peer reviewed papers from the 2nd Green Factory Bavaria Colloquium 2015, September 30 - October 1, 2015, Nuremberg, Germany.

The 34 papers are grouped as follows:

Chapter 1: Energy Efficiency as an Element of a Strategy for Sustainable Production;

Chapter 2: Equipments and Technologies of Sustainable Production

Emerging Functional Materials: Advances in Energy and Environmental Applications

Eds. Alagarsamy Pandikumar, Nay Ming Huang and Hong Ngee Lim

Special topic volume with invited peer reviewed papers only.

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Keyword: Dye-Sensitized Solar Cells, Electron Beam Evaporation, Alloy Films, Staphylococcus Aureus, Jet Nebulizer Spray Pyrolysis

Summary: This Special Topic Volume includes only invited peer reviewed papers. The 14 papers cover different functional materials properties including nanoparticles in biomedical applications, methods of solar cells production and sensors implementation.

Advances in Abrasive Technology XVIII

Eds. Hon-Zong Choi, Haedo Jeong, Xiping Xu and Hideki Aoyama

Selected, peer reviewed papers from the 18th International Symposium on Advances in Abrasive Technology (ISAAT 2015), October 4-7, 2015, Juju Island, Korea

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Abrasive Machining, Advanced Cutting Technology, Grinding, Lapping, Polishing, Finishing, Tribology, Surface Integrity

Summary: Collection of selected, peer reviewed papers from the 18th International Symposium on Advances in Abrasive Technology (ISAAT 2015), October 4-7, 2015, Juju Island, Korea.

The 114 papers are grouped as follows:

Chapter 1: Grinding

Chapter 2: Abrasive Jet Machining

Chapter 3: Advanced Cutting Technology

Chapter 4: Processing of Brittle Materials

Chapter 5: Chemical Mechanical Polishing, Processing of Semiconductor Wafer

Chapter 6: Electrical Discharge Machining, Ultrasonic and Beam Machining

Chapter 7: Finishing, Lapping and Polishing

Chapter 8: Surface and Subsurface Integrity and Materials Characterization

Chapter 9: In-Process Measurement and Monitoring, Metrology

Chapter 10: Machine Tools and Systems, Tooling Processing

Mechanical and Aerospace Engineering VI

Eds. Dashnor Hoxha, Ian McAndrew and ANH DUNG NGO

Selected, peer reviewed papers from the 2015 6th International Conference on Mechanical and Aerospace Engineering (ICMAE 2015), July 16-17, 2015, Roma, Italy

ISBN 13: 978-3-03835-523-6 (paperback)
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Keyword: Applied Mechanics, Design and Manufacturing, Material Characterisation and Modeling, Dynamics and Vibration, Computational Techniques, Simulation and Numerical Analysis, Fluid Dynamics and CFD, Instrumentation, Monitoring, Control Systems and Automatics, Aerodynamics and Aerospace Applications, Thermal Analysis, Energy Efficiency and Applications, Motors, Combustion and Propulsion

Summary: Collection of selected, peer reviewed papers from the 2015 6th International Conference on Mechanical and Aerospace Engineering (ICMAE 2015), July 16-17, 2015, Roma, Italy.

The 109 papers are grouped as follows:

Chapter 1: Designing and Manufacturing in Mechanical Engineering

Chapter 2: Dynamics and Vibration of Machines and Mechanisms

Chapter 3: Fluids and Thermal Engineering

Chapter 4: Researching and Designing of Internal Combustion Engine

Chapter 5: Instrumentation, Monitoring, Control Systems and Automatics

Chapter 6: Materials and Materials Processing in Mechanical Engineering

Chapter 7: Computational Techniques for Simulation and Numerical Analysis

Chapter 8: Researching and Designing in Aerospace Engineering

Innovative Materials and Technology for Sustainable Development of Society

Ed. Rattikorn Yimmirun

Selected, peer reviewed papers from the 5th RMUTP International Conference on Science, Technology and Innovation for Sustainable Development: the Road towards a Green Future, July 17-18, 2014, Bangkok, Thailand

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Keyword: Sustainability Science, Green Product Innovation, Sustainable Development, Green Materials Science, Alternative Energy, Environmental Science, Sustainability Education

Summary: Collection of selected, peer reviewed papers from the 5th RMUTP International Conference on Science, Technology and Innovation for Sustainable Development: the Road towards a Green Future, July 17-18, 2014, Bangkok, Thailand. The 82 papers are grouped as follows: Chapter 1: Ceramics, Semiconductors and Composites; Chapter 2: Recent Building Materials; Chapter 3: Biomaterials and Biomedical Engineering; Chapter 4: Materials and Technologies in Textile Industry; Chapter 5: Advanced Technologies in Agriculture, Environmental Engineering and Waste Treatment and Recycling; Chapter 6: Engineering Decisions in Designing of Machines and Power; Chapter 7: Innovative Technologies Education for Sustainable Development of Society

Materials, Industrial, and Manufacturing Engineering Research Advances 2

Eds. Denni Kurniawan and Fethma M. Nor

Selected, peer reviewed papers from the 2nd International Materials, Industrial, and Manufacturing Engineering Conference (MIMEC2015), February 4-6, 2015, Bali, Indonesia

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Materials, Industry, Manufacturing, Processes, System, Applications

Summary: Collection of selected, peer reviewed papers from the 2nd International Materials, Industrial, and Manufacturing Engineering Conference (MIMEC2015), February 4-6, 2015, Bali, Indonesia. The 123 papers are grouped as follows: Chapter 1: Materials Engineering, Chemical Technologies and Materials Processing; Chapter 2: Materials and Technologies in Environmental Engineering, Bio- and Green Production; Chapter 3: Materials and Technologies in Construction; Chapter 4: Materials and Technologies for Biomedical Application; Chapter 5: Technological Equipments and Machines; Chapter 6: Industrial Engineering

Progress in Production Engineering

Eds. Jens P. Wulfsberg, Benny Röhlig and Tobias Montag

Selected, peer reviewed papers from the 2015 WGP Congress, September 7-8, 2015, Hamburg, Germany

ISBN 13: 978-3-03835-616-5 (paperback)
Publication Date: 2015 (11/2015)
Direct URL: <http://www.ttp.net/html/978-3-03835-616-5>
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eBook: 978-3-0357-0095-4 €250.00/US\$280.00
(both sold separately, eBook prices includes multi-user IP access)

Keyword: Materials Properties, Materials Processing, Cooling, Lubrication, Deformation

Summary: Collection of selected, peer reviewed papers from the 2015 WGP Congress, September 7-8, 2015, Hamburg, Germany. The 71 papers are grouped as follows: Chapter 1: Assembly; Chapter 2: Forming; Chapter 3: Cutting and Finishing Operations; Chapter 4: Joining; Chapter 5: Machine Tools; Chapter 6: Organisation of Manufacturing

Safety and Durability of Buildings and Structures

Eds. Vladimír Křístek, Pavel Maňas and Alexander Kravcov

Selected, peer reviewed papers from the International Conference on Building Safety and Secure 2015, August 10-12, 2015, Prague, Czech Republic

ISBN 13: 978-3-03835-617-2 (paperback)
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Direct URL: <http://www.ttp.net/html/978-3-03835-617-2>
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eBook: 978-3-0357-0096-1 €125.00/US\$140.00
(both sold separately, eBook prices includes multi-user IP access)

Keyword: Risk Analysis and Risk Management, Safety Material Engineering, Integrated Safety Design Process, Critical Infrastructure Protection, Building Sustainability

Summary: Collection of selected, peer reviewed papers from the International Conference on Building Safety and Secure 2015, August 10-12, 2015, Prague, Czech Republic.

The book covers a wide range of topics: Durability of Composites, Prospective Materials, Construction Industry, Concrete Damage Evolution, Construction Ecological Requirements

Modern Civil Engineering in Trend of the Sustainable Infrastructure Development

Eds. Hamidi Abdul Aziz, Meor Othman Hamzah, Fauziah Ahmad, Badorul Hisham Abu Bakar, Ismail Abustan et al.

Selected, peer reviewed papers from the eco-AWAM International Conference on Civil Engineering 2015 (eco-AICCE'15), September 9-11, 2015, Kuala Lumpur, Malaysia

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Civil Engineering; Sustainable Infrastructure; Infrastructure Sustainability; Project Planning; Advanced Analysis; Innovative Material and Design; Green Technology and Solution; Facility Management; Environmental, Societal and Economical Impacts; Maintenance; Construction Planning and Management; Green Construction

Summary: Collection of selected, peer reviewed papers from the eco-AWAM International Conference on Civil Engineering 2015 (eco-AICCE'15), September 9-11, 2015, Kuala Lumpur, Malaysia.

The 114 papers are grouped as follows: Chapter 1: Geotechnical Engineering; Chapter 2: Structural Engineering; Chapter 3: Highway and Transportation Engineering; Chapter 4: Environmental Engineering; Chapter 5: Water Resources Engineering; Chapter 6: Construction Management

IT Systems and Decisions in Business and Industry Practice

Eds. Janusz K. Grabara and Sebastian Kot

Selected, peer reviewed papers from the International Conference XXII MOUNTAIN SCHOOL OF ASSOCIATION OF INFORMATION SOCIETY, June 22-24, 2015, Czestochowa, Poland

ISBN 13: 978-3-03835-620-2 (paperback)

Publication Date: 2015 (11/2015)

Direct URL: <http://www.ttp.net/html/978-3-03835-620-2>

276 pages, paperback, €125.00/US\$135.00

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eBook: 978-3-0357-0099-2 €125.00/US\$135.00

(both sold separately, eBook prices includes multi-user IP access)

Keyword: Information Technology, Administration informatization, Information Society, IT Systems Application, Informatisation Strategy

Summary: Selected, peer reviewed papers from the International Conference XXII MOUNTAIN SCHOOL OF ASSOCIATION OF INFORMATION SOCIETY, June 22-24, 2015, Czestochowa, Poland.

The book contains 35 papers and covers a wide range of topics: Information Technology, Information Society, Information Strategy, Computer System and Information Management

LOGI 2015 – 16th International Scientific Conference

Ed. Ondrej Stopka

Selected, peer reviewed papers related to Development of Manufacturing, Transport and Information Technologies in Industrial Logistics from the LOGI 2015, October 29, 2015, České Budějovice, Czech Republic

ISBN 13: 978-3-03835-622-6 (paperback)
Publication Date: 2015 (11/2015)
Direct URL: <http://www.ttp.net/html/978-3-03835-622-6>
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eBook: 978-3-0357-0101-2 €125.00/US\$140.00
(both sold separately, eBook prices includes multi-user IP access)

Keyword: Novel Trends, Development, Industrial Logistics, Manufacturing Technologies and Systems, Information Technologies, Logistics Technologies, Transport Technologies, Production Technologies and Systems

Summary: Collection of selected, peer reviewed papers related to Development of Manufacturing, Transport and Information Technologies in Industrial Logistics from the LOGI 2015, October 29, 2015, České Budějovice, Czech Republic.

The 31 papers are grouped as follows:

Chapter 1: Organization of Production, Transport and Logistics Systems;

Chapter 2: Development and Research of Technological Equipment and Machines

COMAT 2014 - Recent Trends in Structural Materials

Eds. Jan Džugan and Zbyšek Nový

Selected, peer reviewed papers from the 3rd International Conference COMAT on Recent Trends in Structural Materials, November 19-21, 2014, Pilsen, Czech Republic

ISBN 13: 978-3-03835-623-3 (paperback)
Publication Date: 2015 (11/2015)
Direct URL: <http://www.ttp.net/html/978-3-03835-623-3>
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eBook: 978-3-0357-0102-9 €125.00/US\$140.00
(both sold separately, eBook prices includes multi-user IP access)

Keyword: Metallurgy, Forming, Rolling, Heat Treatment, Thermomechanical Treatment, Computer Simulation, Mechanical Testing, Small Size Samples, Structural Materials

Summary: Collection of selected, peer reviewed papers from the 3rd International Conference COMAT on Recent Trends in Structural Materials, November 19-21, 2014, Pilsen, Czech Republic.

The book contains 21 papers and covers a wide range of topics: Mechanical Properties, Forming and Microstructure Development, Investigation of Steel, Wear Resistance, Thermo-Mechanical Treatments, Defects Detecting.

Acoustics & Vibration of Mechanical Structures II

Eds. Nicolae Herisanu and Vasile Marinca

Selected, peer reviewed papers from the XIII International Symposium Acoustics & Vibration of Mechanical Structures (AVMS 2015), May 28-29, 2015, Timișoara, Romania

ISBN 13: 978-3-03835-628-8 (paperback)

Publication Date: 2015 (11/2015)

Direct URL: <http://www.ttp.net/html/978-3-03835-628-8>

350 pages, paperback, €125.00/US\$140.00

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eBook: 978-3-0357-0109-8 €125.00/US\$140.00

(both sold separately, eBook prices includes multi-user IP access)

Keyword: Vibration, Noise, Analytical Techniques, Experimental Approaches, Simulation

Summary: Collection of selected, peer reviewed papers from the XIII International Symposium Acoustics & Vibration of Mechanical Structures (AVMS 2015), May 28-29, 2015, Timișoara, Romania. The 53 papers are grouped as follows: Chapter 1: Analytical Approaches to Nonlinear Problems; Chapter 2: Environmental and Occupational Noise; Chapter 3: Structural Vibration; Chapter 4: Vibration Problems in Industrial Processes; Chapter 5: Biomechanics; Chapter 6: Measurements in Vibration Problems

Thermophysics and Mass Transfer in Materials Science and Construction

Eds. Igor Medved and Anton Trnik

Selected, peer reviewed papers from the 20th Thermophysics 2015, October 14-16, 2015, Terchova, Slovakia

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Keyword: Thermophysical Properties of Materials and Testing Methods, Thermal Performance and Material Properties, PCM Materials, Moisture Related Problems, Thermal Insulation Materials, Calorimetric Measurements, High Temperature Analysis, Composite Materials, Dynamic and Transient Measurements, Uncertainty Estimation

Summary: Collection of selected, peer reviewed papers from the 20th Thermophysics 2015, October 14-16, 2015, Terchova, Slovakia. The 30 papers reflect recent achievements on different problems of heat transfer in liquid, solid and gaseous substances and computational methods for their solving as well as methods of materials thermophysical properties measurements. Theoretical methods are illustrated with comprehensive examples from practical applications.

Mechanical and Electrical Technology VII

Eds. Guanghsu Chang, Jieh-Shian Young and Wirachman Wisnoe

Selected, peer reviewed papers from the 2015 7th International Conference on Mechanical and Electrical Technology (ICMET 2015), July 1-2, 2015, Bali, Indonesia

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Materials Engineering, Mechanical Engineering, Electrical Engineering, Power and Energy Engineering, Measurement Technologies, Integrated Circuits, Mechatronics and Robotics, Manufacturing

Summary: Collection of selected, peer reviewed papers from the 2015 7th International Conference on Mechanical and Electrical Technology (ICMET 2015), July 1-2, 2015, Bali, Indonesia.

The 267 papers are grouped as follows:

- Chapter 1: Materials and Technologies of Chemical Industry;
- Chapter 2: Steels and Alloys;
- Chapter 3: Materials Processing and Manufacturing Tool in Mechanical Engineering;
- Chapter 4: Materials and Technologies in Biomedicine;
- Chapter 5: Designing and Engineering Decisions in Mechanical Engineering;
- Chapter 6: Motor Systems and Vehicle Engineering;
- Chapter 7: Sensors and Technologies of Measurement;
- Chapter 8: Robotics, Mechatronics and Control;
- Chapter 9: Power Engineering;
- Chapter 10: Electrical Engineering and Power Electronics;
- Chapter 11: Industrial Engineering

Advanced Technologies of Materials Processing

Eds. Daniel Munteanu and Mircea Horia Tierean

Selected, peer reviewed papers from the International Conference on Materials Science and Engineering, BraMat 2015, March 4-7, 2015, Brasov, Romania

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Materials Science, Materials Testing, Surface Engineering, Welding, Simulation

Summary: Collection of selected, peer reviewed papers from the International Conference on Materials Science and Engineering, BraMat 2015, March 4-7, 2015, Brasov, Romania. The 51 papers are grouped as follows: Chapter 1: Materials and Technologies in Metallurgy; Chapter 2: Composites and Polymers; Chapter 3: Advanced Welding Technologies; Chapter 4: Mechanical Processing of Materials; Chapter 5: Heat Treatment and Surface Engineering; Chapter 6: Technological Machines and Equipments

Journal of Metastable and Nanocrystalline Materials Vol. 27

New Quasiatomic Nanoheterostructures: Artificial Atoms and Quasimolecules: Theory

Ed. Sergey I. Pokutnyi

Special topic volume with invited peer reviewed papers only.

ISBN 13: 978-3-03835-882-4 (paperback)

Publication Date: 2015 (09/2015)

Direct URL: <http://www.ttp.net/html/978-3-03835-882-4>

52 pages, paperback, €125.00/US\$135.00

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Artificial Atoms, Quasimolecules, Quantum Dots, Quasiatomic Nanoheterostructures, Optical and Electronic Properties

Summary: In the monograph the theory of artificial atom formed from spatially separated electrons and holes (hole moving in the volume of a semiconductor (dielectric) quantum dot and an electron localized on the outer spherical interface between the quantum dot and a dielectric matrix) is developed. Predicted a new hydrogen - artificial atom, which is similar to the new alkali - metal atom. This review discusses the current state of research of artificial atoms (quasiatomic nanoheterostructures) and more complex nanostructures based on them - synthetic quasimolecules, proposed a new model of an artificial atom, satisfactorily explaining its optical and electronic properties, as well as the prospects for the development of the new scientific field.

A theory is developed for the interaction of an electromagnetic field with one-particle quantum-confined states of charge carriers in semiconductor quantum dots. In the context of dipole approximation it is established that the gigantic optical absorption cross sections in the quasi-zero-dimensional systems make it possible to use the systems as efficient absorbing materials. The effects of the resonant interaction of light with such local electron states in presence and in absence of a homogeneous magnetic field are investigated.

Diffusion in Materials

Eds. S.V. Divinski, H. Bracht and N.A. Stolwijk

Selected, peer reviewed papers from the International Conference on Diffusion in Materials (DIMAT 2014), August 17-22, 2014, Münster, Germany

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Keyword: Diffusion, Simulation, Interdiffusion, Phase Formation, Strong Gravity, Ion Transport, Grain Boundary, Triple Junction, Point Defects, Stresses

Summary: Collection of selected, peer reviewed papers from the International Conference on Diffusion in Materials (DIMAT 2014), August 17-22, 2014, Münster, Germany.

The 34 papers are grouped as follows:

Chapter 1: Reactions and Interdiffusion in Binary and Multicomponent Systems;

Chapter 2: Ion Transport;

Chapter 3: Defects, Stresses and Relaxation;

Chapter 4: Short-Circuit Diffusion;

Chapter 5: Diffusion Phenomena under Strong Gravitation;

Chapter 6: Diffusion-Related Phenomena;

Chapter 7: Advanced Methods of Diffusion Measurement

Advanced Engineering Materials and Processing Technologies

Eds. Wang Guanglin, Wang Huifeng, Zhang Xiang, Li Yuefeng, Li Chengcheng and Li Ye

Special topic volume with invited peer reviewed papers only.

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Keyword: Material Machining and Automation; Material Performance, Material Testing, New Material Preparation and Application, methods, biomechanics

Summary: Collection of selected, peer reviewed papers from the special topic volume with invited peer reviewed papers only.

The 95 papers are grouped as follows: Chapter 1: Research and Development of Technologies and Tools for Material Processing; Chapter 2: Properties of Materials; Chapter 3: Materials in Construction; Chapter 4: Measurements, Testing and Monitoring in Mechanical Engineering; Chapter 5: Research and Design Machines and Units of Technological Equipment

Materials and Construction Technologies for Sustainable Development

Ed. Mohammad Arif Kamal

Special topic volume with invited peer reviewed papers only.

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Keyword: Materials Properties, Construction Technologies, Energy Efficiency, Insulation Material, Building Certification

Summary: Construction is a major industry in all countries and great deal of natural resources are consumed in buildings. Buildings have a significant and continuously increasing impact on the environment since they are responsible for a large portion of carbon emissions and use a considerable number of resources. This special volume on 'Materials and Construction Technologies for Sustainable Development' contains Eleven chapters which address a wide range of issues pertaining to building materials with reference to energy efficiency. The volume will be of special interest to environmentally conscious engineers, producers of building materials, architects, building professional and it may also be useful to scientists and researchers.

Ferrites and Ceramic Composites II

Eds. Rajshree B. Jotania and Hardev Singh Virk

Special topic volume with invited peer reviewed papers only.

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Publication Date: 2015 (02/2016)

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Keyword: Nanofibers, Nanoferrites, Nanoparticles, Syntesis, Biomedical Application

Summary: This special volume on 'Ferrites and Ceramic Composites II' contains a wide range of issues pertaining to nanomaterials. The volume will be of special interest to scientists and researchers who deal with Nanoparticles.

The book covers a wide range of topics: Nanoparticles Synthesis and Properties, Nanoferrites, Ferrite Fibres and Nanofibres, Biomedical Applications.

Non-Conventional Materials and Technologies for Sustainable Development

Eds. Khosrow Ghavami, Holmer Savastano Junior and Juliano Fiorelli

Selected, peer reviewed papers from the 15th International Conference on Non-Conventional Materials and Technologies NOCMAT, November 23-25, 2014, Pirassununga, Brazil

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Keyword: Natural Fibers, Plant-based Materials, Construction Materials, Recycling, Agricultural Waste, Urban Waste

Summary: Collection of selected, peer reviewed papers from the 15th International Conference on Non-Conventional Materials and Technologies NOCMAT, November 23-25, 2014, Pirassununga, Brazil. The 51 papers are grouped as follows: Chapter 1: Natural Fibers, Bamboo and Plant-Based Materials; Chapter 2: Non-Conventional and Innovation Research and Technology; Chapter 3: Construction Materials and Technologies for Sustainability, Energy Efficiency, Affordable Housing; Chapter 4: Recycling of Industrial Materials, Agricultural and Urban Waste

Advances in Fracture and Damage Mechanics XIV

Eds. Darko Bajić, Zdenko Tonković and Ferri Aliabadi

Selected, peer reviewed papers from the 14th International Conference on Fracture and Damage Mechanics (FDM 2015), September 21-23, 2015, Budva, Montenegro

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eBook: 978-3-0357-0012-1 €190.00/US\$210.00
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Keyword: Failure Analysis, Fracture Mechanics, Corrosion, Non-linear problems, Dynamic Fracture, Crack Propagation, Metallic and Concrete Materials, Microstructural and Multiscale Aspects

Summary: Collection of selected, peer reviewed papers from the 14th International Conference on Fracture and Damage Mechanics (FDM 2015), September 21-23, 2015, Budva, Montenegro. The FDM2015 covers a wide range of topics: Structural Integrity, Failure analysis, Fracture Mechanics, Composites, Structural Health Monitoring, Damage Tolerance, Corrosion, Creep, Non-linear problems, Dynamic Fracture, Residual Stress, Environmental effects, Crack Propagation, Metallic and Concrete Materials, Probabilistic Aspects, Computer Modelling Methods, Microstructural and Multiscale Aspects.

26th Symposium on Experimental Mechanics of Solids

Eds. Pawel Pyrzanowski and Jacek Gadomski

Selected, peer reviewed papers from the 26th Symposium on Experimental Mechanics of Solids, October 22-25, 2014, Jachranka, Poland

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Keyword: Experimental Mechanics, Experimental Methods, Stress Analysis, Solid Mechanics, Opticalmethods, Biomechanics

Summary: Collection of selected, peer reviewed papers from the 26th Symposium on Experimental Mechanics of Solids, October 22-25, 2014, Jachranka, Poland.

The 40 papers are grouped as follows:

Chapter 1: Experimental and Numerical Methods and Equipments for Practical Investigation and Engineering Designing;

Chapter 2: Investigation Processes of Fatigue and Fracture;

Chapter 3: Investigations Mechanical Properties of Advanced Materials;

Chapter 4: Experimental Methods for Investigations of Devices, Machines and Structures

Advances in Very High Cycle Fatigue

Ed. Qingyuan Wang

Selected, peer reviewed papers from the 6th International Conference on Very High Cycle Fatigue (VHCF), October 15-18, 2014, Chengdu, China

ISBN 13: 978-3-03835-575-5 (paperback)
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eBook: 978-3-0357-0049-7 €120.00/US\$140.00
(both sold separately, eBook prices includes multi-user IP access)

Keyword: Very High Cycle Fatigue; Influence on Fatigue Life; Ultrasonic Fatigue Testing Technology; Crack Initiation Mechanism; Fatigue Life Prediction

Summary: Collection of selected, peer reviewed papers from the 6th International Conference On Very High Cycle Fatigue (VHCF), October 15-18, 2014, Chengdu, China.

The 34 papers are grouped as follows:

- Chapter 1: Scientometric Researches in area of Very High Cycle Fatigue;
- Chapter 2: Advancements in Very High Cycle Fatigue Instrumentations;
- Chapter 3: Advanced Materials on Very High Cycle Fatigue;
- Chapter 4: Influence of Environment and Temperature;
- Chapter 5: Influence of Small Damages Conditions;
- Chapter 6: Microstructure and Initiation Mechanism;
- Chapter 7: Life Prediction and Modeling

Processing Ceramics from Waste: A New Raw Material Source for a Global Change

Eds. Carmen Martínez García, Salvador Bueno and Michele Dondi

Selected, peer reviewed papers from the International Workshop on “Processing Materials from Waste”, September 29 - October 1, 2014, Baeza, Spain

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(both sold separately, eBook prices includes multi-user IP access)

Keyword: Mechanical Properties, Traditional Materials, Environmental, Industrial Wastes Recycling, Raw Material Source

Summary: Collection of selected, peer reviewed papers from the International Workshop on “Processing Materials from Waste”, September 29 - October 1, 2014, Baeza, Spain.

The 17 papers are grouped as follows:

Chapter 1: New Developments from Waste;

Chapter 2: Waste Incorporation in Traditional Materials;

Chapter 3: Analysis of Waste, Materials Properties and Production