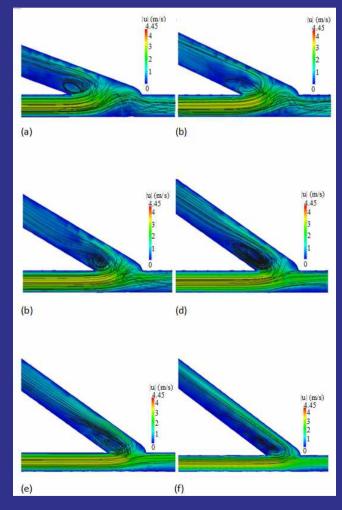
ISSN: 1937-6871 Volume 8, Number 3, March 2015



JBISE

Journal of Biomedical Science and Engineering





Editor-in-Chief Kuo-Chen Chou

Journal Editorial Board

ISSN 1937-6871 (Print) ISSN 1937-688X (Online)

http://www.scirp.org/journal/jbise

Editor-in-Chief

Prof. Kuo-Chen Chou Gordon Life Science Institute, San Diego, California, USA

Editorial Board

Prof. Suleyman I. Allakhverdiev Institute of Basic Biological Problems, Russia

Prof. Christopher J. Branford-White London Metropolitan University, UK

Prof. Thomas Casavant University of Iowa, USA

Dr. Feng ChengUniversity of South Florida, USAProf. Senshi FukashiroThe University of Tokyo, JapanProf. Dayong GaoUniversity of Washington, USA

Dr. Ernesto Goldman Ohio State University Wexner Medical Center, USA

Prof. Reba Goodman
Columbia University, USA
Prof. Ridha Hambli
Orleans University, France
Dr. Zeng-Jian Hu
Howard University, USA
Prof. Takeshi Kikuchi
Ritsumeikan University, Japan
Prof. Rob Krams
Imperial College London, UK

Dr. Lukasz KurganUniversity of Alberta, CanadaProf. Juan LiuWuhan University, China

Dr. Girdhar K. Pandey University of Delhi South Campus, India

Prof. Panagote (Panos) M. Pardalos University of Florida, USA

Prof. Kota V. Ramana University of Texas Medical Branch, USA

Dr. Yanmei Tie Harvard Medical School, USA

Prof. Giuseppe VairoUniversity of Rome "Tor Vergata", Italy

Dr. Murali Mohan Yallapu Sanford Research, USA

Prof. Zhizhou Zhang Harbin Institute of Technology, China

Guest Reviewers

Prabakar Srinivasan

Yongyuan Zang

Journal of Biomedical Science and Engineering (JBiSE)

Journal Information

SUBSCRIPTIONS

The *Journal of Biomedical Science and Engineering* (Online at Scientific Research Publishing, www.SciRP.org) is published monthly by Scientific Research Publishing, Inc., USA.

Subscription rates:

Print: \$89 per issue.

To subscribe, please contact Journals Subscriptions Department, E-mail: sub@scirp.org

SERVICES

Advertisements

Advertisement Sales Department, E-mail: service@scirp.org

Reprints (minimum quantity 100 copies)

Reprints Co-ordinator, Scientific Research Publishing, Inc., USA.

E-mail: sub@scirp.org

COPYRIGHT

COPYRIGHT AND REUSE RIGHTS FOR THE FRONT MATTER OF THE JOURNAL:

Copyright © 2015 by Scientific Research Publishing Inc.

This work is licensed under the Creative Commons Attribution International License (CC BY). http://creativecommons.org/licenses/by/4.0/

COPYRIGHT FOR INDIVIDUAL PAPERS OF THE JOURNAL:

Copyright © 2015 by author(s) and Scientific Research Publishing Inc.

REUSE RIGHTS FOR INDIVIDUAL PAPERS:

Note: At SCIRP authors can choose between CC BY and CC BY-NC. Please consult each paper for its reuse rights.

DISCLAIMER OF LIABILITY

Statements and opinions expressed in the articles and communications are those of the individual contributors and not the statements and opinion of Scientific Research Publishing, Inc. We assume no responsibility or liability for any damage or injury to persons or property arising out of the use of any materials, instructions, methods or ideas contained herein. We expressly disclaim any implied warranties of merchantability or fitness for a particular purpose. If expert assistance is required, the services of a competent professional person should be sought.

PRODUCTION INFORMATION

For manuscripts that have been accepted for publication, please contact:

E-mail: jbise@scirp.org



Table of Contents

Volume 8 Number 3	March 2015
Structural Changes of the Liver Vessels in Compensated and Decompensated Coarctation of Aorta in Experimental Studies	
S. V. Shormanov, S. V. Kulikov	123
Computational Analysis of Anastomotic Angles by Blood Flow Conditions in Side-to-End Radio-Cephalic Fistulae Used in Hemodialysis	
J. A. Silva, J. Karam-Filho, C. C. H. Borges	131
Involvement of Autoimmune Diseases in the Pathogenesis of Chronic Immune Thrombocytopenic Purpura	
M. Mocanu, M. Bădescu, M. Ciocoiu, C. Bădescu, C. E. Iancu, O. Bădulescu	142
Tanshinone IIA Could Inhibit Pancreatic Cancer BxPC-3 Cells through Increasing PERK, ATF6, Caspase-12 and CHOP Expression to Induce Apoptosis	
CC. Su	149
Functional Recovery of Axonal Injury Induced by Gelatin-Hydrogel Film and PRP: An Initial Study in Rats	
R. Ardhani, R. Susilowati, I. D. Ana	160
Reliability and Precision Are Optimal for Non-Uniform Distributions of Presynaptic Release Probability	
JM. Fellous, N. S. Corral-Frías	170
Exploration of the Relationship between Adipocytokines, Tradition Risk Markers, Nontraditional Risk Markers and Anthropometric Measurements in T2DM Patients	
N. S. Al-Sowayan	184
Optical Fiber Lightening for Fluorescence Signal Detection with Thermal Stability in Dentist	ry
J. B. Eom, I. H. Shin, H. J. Park, BI. Lee	201
The Potential of Compact Libs System with Multi-Pulse Nd:YAG Laser for Bacteria Identification	ation
A. P. Flores, A. K. F. Sanchez, A. Villarreal, F. G. R. Sauz, L. P. Cabrera, T. F. Reyes	207
Regional Heterogeneity in 3D Myocardial Shortening in Hypertensive Left Ventricular Hypertrophy: A Cardiovascular CMR Tagging Substudy to the Life Study	
R. W. W. Biederman, A. A. Young, M. Doyle, R. B. Devereux, E. Kortright, G. Perry, J. N. Bella, S. Opar D. Calhoun, G. M. Pohost, L. J. Dell'Italia	

The figure on the front cover is from the article published in J. Biomedical Science and Engineering, 2015, Vol. 8, No. 3, pp. 131-141 by Janaína de Andrade Silva, José Karam-Filho and Carlos Cristiano H. Borges.

Journal of Biomedical Science and Engineering (JBiSE)

http://www.scirp.org/journal/jbise

JBiSE, an international journal, publishes research and review articles in all important aspects of biology, medicine, engineering, and their intersection. Both experimental and theoretical papers are acceptable provided they report important findings, novel insights, or useful techniques in these areas. All manuscripts must be prepared in English, and are subject to a rigorous and fair peer-review process. Accepted papers will immediately appear online followed by printed in hard copy.

Subject Coverage

- Applied Biomaterials
- Bioelectrical and Neural Engineering
- Bioinformatics and Computational Biology
- Biomechanics and Biotransport
- Biomedical and Environmental Sciences
- Biomedical Chemistry
- Biomedical Chromatography
 Biomedical Devices, Sensors, Artificial Organs and Nano Technologies
- Biomedical Engineering
- Biomedical Imaging, Processing and Visualization
- Biomedical Informatics
- Biomedical Materials
- Biomedical Microdevices
- Biomedical Modeling
- Biomedical Sciences and Applications
- Biomedical Semantics
- Biomedical Signal Processing and Control
- Biomedicine and Biotechnology
- Biomedicine and Pharmacotherapy
- Clinical Engineering, Wearable and Real-Time Health Monitoring Systems
- Computer Methods and Programs in Biomedicine
- Genetic Engineering
- Genomics
- History and Philosophy of Biomedical Sciences
- Mechanical Behavior of Biomedical Materials
- Medical Biochemistry
- Medical Cell Biology
- Molecular and Genetic Medicine
- Nano-Bio-Analysis

- Negative Results in Biomedicine
 NMR in Biomedicine
 NMR/CT/ECG Technologies and Electromagnetic Field Simulation
 Nonlinear Biomedical Physics
- Numerical Methods in Biomedical Engineering
 Pharmaceutical and Biomedical Analysis
- Physiological Signal Processing
- Proteomics
- Software, Tools and Application in Medical Engineering
 Structure-Based Drug Design

Notes for Intending Authors

Submitted papers should not have been previously published nor be currently under consideration for publication elsewhere. Paper submission will be handled electronically through the website. All papers are refereed through a peer review process. For more details about the submissions, please access the website.

Website and E-Mail

http://www.scirp.org/journal/jbise

Email: jbise@scirp.org



Editor-in-Chief

Prof. Kuo-Chen Chou

Gordon Life Science Institute, San Diego, California, USA

Editorial Board

Prof. Suleyman I. Allakhverdiev Prof. Christopher J. Branford-White

Prof. Thomas Casavant Dr. Feng Cheng

Prof. Senshi Fukashiro

Prof. Dayong Gao Dr. Ernesto Goldman

Prof. Reba Goodman

Prof. Ridha Hambli

Dr. Zeng-Jian Hu Prof. Takeshi Kikuchi

Prof. Rob Krams

Dr. Lukasz Kurgan

Prof. Juan Liu

Dr. Girdhar K. Pandey

Prof. Panagote (Panos) M. Pardalos Prof. Kota V. Ramana

Dr. Yanmei Tie Prof. Giuseppe Vairo

Dr. Murali Mohan Yallapu

Prof. Zhizhou Zhang

Institute of Basic Biological Problems, Russia London Metropolitan University, UK University of Iowa, USA

University of South Florida, USA The University of Tokyo, Japan

University of Washington, USA Ohio State University Wexner Medical Center, USA

Columbia University, USA

Orleans University, France Howard University, USA Ritsumeikan University, Japan Imperial College London, UK

University of Alberta, Canada Wuhan University, China

University of Delhi South Campus, India University of Florida, USA

University of Texas Medical Branch, USA Harvard Medical School, USA

University of Rome "Tor Vergata", Italy Sanford Research, USA Harbin Institute of Technology, China

ISSN 1937-6871 (Print), 1937-688X (Online)