



Green and Sustainable Chemistry





Journal Editorial Board

ISSN Print: 2160-6951 ISSN Online: 2160-696X https://www.scirp.org/journal/gsc

Editor-in-Chief

Prof. Nour-Eddine Es-Safi Mohammed V University in Rabat, Morocco

Editorial Board

Prof. Abbas AfkhamiBu-Ali Sina University, IranProf. Salah AkkalUniversity of Constantine, AlgeriaProf. Nelson BelzileLaurentian University, Canada

Prof. Asim Bhaumik Indian Association for the Cultivation of Science, India

Prof. Pradip K. BhowmikUniversity of Nevada, USAProf. George BratulescuUniversity of Craiova, Romania

Prof. Chieh-Ming James ChangNational Chung Hsing University, Chinese TaipeiProf. Jo-Shu ChangNational Cheng Kung University, Chinese Taipei

Prof. Xiu-Yun Chuan Peking University, China

Prof. T. C. ChungThe Pennsylvania State University, USAProf. Mircea DarabantuUniversity Babes-Bolyai, RomaniaProf. Zhen FangChinese Academy of Sciences, ChinaDr. Majid GhashangIslamic Azad University, Iran

Dr. Qilin Huang Huazhong Agriculture University, China

Prof. Mo Hunsen Kenyon College, USA

Prof. William E. Acree Jr.

The University of North Texas, USA

Prof. György Keglevich Budapest University of Technology and Economics, Hungary

Prof. Shailendra Kumar KulshreshthaAtomic Energy Education Society, IndiaProf. Yoon-Sik LeeSeoul National University, South KoreaProf. Silvia LicocciaUniversity of Rome Tor Vergata, Italy

Prof. Yangsheng Liu Peking University, China

Dr. Ying-Ling Liu National Tsing Hua Univesity, Chinese Taipei

Prof. Averous LucUniversity of Strasbourg, FranceProf. Ram S. MohanIllinois Wesleyan University, USAProf. S. V. Ranga NayakuluGuru Nanak Engg College, IndiaProf. Nagatoshi NishiwakiKochi University of Technology, JapanProf. Kotohiro NomuraTokyo Metropolitan University, Japan

Prof. Batchu Venkateswara Rao Indian Institute of Chemical Technology, India

Prof. Ismael Saadoune Faculty of Science and Technologies Marrakesh, Morocco

Prof. Mohammed Abd El-Dayem SallamAlexandria University, EgyptProf. Zhihui ShaoYunnan University, China

Prof. Yongsoon Shin Pacific Northwest National Laboratory, USA

Prof. Artur Manuel Soares Silva Universidade de Aveiro, Portugal

Prof. Gurdip SinghDeen Dayal Upadhyay Gorakhpur University, IndiaDr. Prakash R. SomaniApplied Science Innovations Pvt. Ltd., India

Prof. Gonghua Song East China University of Science and Technology, China

Prof. Piotr Stepnowski University of Gdańsk, Poland

Prof. S. Vasudevan Principal Scientist & Professor (AcSIR), India

Dr. Chuan Wang Department of Chemistry University of Chicago, China

Prof. Hongjie ZhangChinese Academy of Sciences, ChinaDr. Xiaowei ZhouNorthwestern University, USAProf. Jin ZhuNanjing University, China



Volume 9

Number 4

ISSN Online: 2160-696X ISSN Print: 2160-6951

November 2019

Table of Contents

Perfect Solvent- and Catalyst-Free Syntheses of Imine Derivatives Using the Pressure Reduction Technique
S. Suzuki, H. Ito, S. Ishizuka, R. Nonaka, M. Noike, T. Kodama, K. Funaki, M. Taguchi, T. Kagaya, S. Sato, G. Redler, Y. Yokoyama
Treatment of Tannery Wastewater by the Application of Electrocoagulation Process Using Iron and Aluminum Electrodes
A. Deghles
Grafting Methyl Methacrylate onto Silk via Emulsion Graft Copolymerization Using a Diethylzinc Complex Initiator
C. Zhao, H. Okada, M. Asakawa, R. Sugimoto, K. Yoshino
Efficient Solvent-Free Preparation of Imines, and Their Subsequent Oxidation with m -CPBA to Afford Oxaziridines
L. Álvarez-Santamaría, E. Juaristi, A. B. Arroyo-Colín, J. Palma-Flores, F. A. Cabrera-Rivera, J. Escalante143

Green and Sustainable Chemistry (GSC) Journal Information

SUBSCRIPTIONS

The *Green and Sustainable Chemistry* (Online at Scientific Research Publishing, https://www.scirp.org/) is published quarterly by Scientific Research Publishing, Inc., USA.

Subscription rates:

Print: \$79 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 © 2019 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 © 2019 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: gsc@scirp.org



Green and Sustainable Chemistry (GSC)

ISSN Print: 2160-6951 ISSN Online: 2160-696X

https://www.scirp.org/journal/gsc

Green and Sustainable Chemistry (GSC) covers subjects relating to reducing the environmental impact of chemicals and fuels by developing alternative and sustainable technologies that are non-toxic to living things and the environment. The goal of this journal is to provide a platform for scientists and academicians all over the world to promote, share, and discuss various new issues and developments in different areas of Green and Sustainable Chemistry.

Subject Coverage

This journal invites original research and review papers that address the following issues. Topics of interest include, but are not limited to:

Atom-Economic Reaction

Biodegradable Plastics

Biotechnology Alternatives

Biotransformation

Chemical Aspects of Renewable Energy

Design of New, Greener and Safer Chemicals and Materials

Energy-Saving

Environmentally Improved Routes and Methods

Flow Chemistry and Continuous Processing

Greenhouse Effect

Improved Process Engineering

Improved Production Methods, Formulation and Delivery Systems

Methodologies and Tools for Measuring Environmental Impact

Natural Sources

Sustainable Resources

The Use of Biotechnology Alternatives to Chemistry-Based Solutions

Waste Control, Treatment and Disposal

White Pollution

Zero Emission

We are also interested in short papers (letters) that clearly address a specific problem, and short survey or position papers that sketch the results or problems on a specific topic. Authors of selected short papers would be invited to write a regular paper on the same topic for future issues of the GSC.

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

https://www.scirp.org/journal/gsc E-mail: gsc@scirp.org