

ISSN: 2322-0856  
Vol 6, Issue 10  
Oct. 2024

# Journal of Progress in Civil Engineering

Journal of Progress in Civil Engineering (JPCE)

ISSN: 2322-0856

**Bryan House Publishing Limited**  
[contact@bryanhouspub.org](mailto:contact@bryanhouspub.org)  
[www.bryanhouspub.org](http://www.bryanhouspub.org)  
Telephone:  
**0044-121-7813744**



**BRYAN HOUSE PUBLISHING LIMITED**  
Multidisciplinary Academic Journal Publisher



## Journal of Progress in Civil Engineering (JPCE)

ISSN 2322-0856

### Aims and Scope

Introduce the new peer-reviewed, open access journal entitled *Journal of Progress in Civil Engineering (JPCE)* is an international open access journal publication by Bryan House Publishing Limited. We aim to provide a medium of communication for scholarly discussing the developments of Civil and Environmental Engineering sciences.

All manuscripts must be prepared in English and are subject to a rigorous and fair peer-review process. The journal publishes original papers including but not limited to the following fields:

- Assemblage and System
- Behavior of Structures
- Behavior of Structures under Seismic Loads
- Building and Environmental Acoustics
- Building Climate Systems
- Building Energy
- Civil and Environmental Engineering
- Coastal Engineering
- Composite Materials
- Concrete Structures
- Construction Economics
- Construction Engineering
- Design and Performance of Green Building
- Design Optimization of Structures
- Earthquake Engineering
- Energy Efficient Building Technology
- Energy Saving Building Materials
- Fire Engineering
- Foundations Dynamics
- High Performance Concrete
- Hydraulic Engineering
- Life Cycle Engineering
- Materials and Durability
- Materials Engineering
- Municipal or Urban Engineering
- Nondestructive Testing and Evaluation
- Numerical Modelling of Structures
- Optimal Design of Structures
- Properties and Mechanics of Concrete
- Simulation Optimization and Risk Management
- Soil-Structure Interaction
- Structural Engineering
- Structural Reliability Analysis
- Surveying
- Sustainable Structures
- Transportation Engineering
- Ventilation and Indoor Air Quality
- Water Supply and Drainage

We are also interested in: 1) Short Reports - 2-5 page papers where an author can present either preliminary data or an idea with theoretical background but has not yet completed the research needed for a complete paper; 2) Book Reviews - Comments and critiques.

### **Bryan House Publishing Limited.**

E-Mail: [contact@bryanhouspub.org](mailto:contact@bryanhouspub.org)

Official Website: [www.bryanhouspub.org](http://www.bryanhouspub.org)

Address: Flat 4, Huntingdon House Faulkers Farm Drive Edington,  
Birmingham West Midlands, United Kingdom, B23 7XF.

Telephone: 0044-121-7813744

## **Journal of Progress in Civil Engineering (JPCE)**

ISSN 2322-0856

### **Editorial Board**

#### **Editor-in-Chief**

Dr Emilio Bilotta, Università degli studi di Napoli Federico II

#### **Editorial Board Members**

Huriye Bilsel, Geotechnical Engineering, Department of Civil Engineering, Eastern Mediterranean University, Famagusta, North Cyprus

Mariacristina Bonini, Research Assistant and Consultant in Geotechnical Engineering, Politecnico di Torino, Italy

Edward Brylawski, President, GEONOR Instrumentation, Milford, Pennsylvania USA

Joseph A. Caliendo, Department of Civil and Environmental Engineering, Utah State University, Logan UT USA

Helder I. Chamin, Professor-Coordenador, Departamento de Engenharia Geotécnica ISEP|IPP, Porto, Portugal

Dave H. Chan, Department of Civil Engineering, University of Alberta, Edmonton, Alberta, Canada

Deepankar Choudhury, Associate Professor, Department of Civil Engineering, Indian Institute of Technology (IIT) Bombay, Powai, Mumbai, India

### **Copyright**

*Journal of Progress in Civil Engineering (JPCE)* is licensed under a Creative Commons-Non-Commercial 4.0 International Copyright (CC BY-NC4.0). Readers shall have the right to copy and distribute articles in this journal in any form in any medium, and may also modify, convert or create on the basis of articles. In sharing and using articles in this journal, the user must indicate the author and source, and mark the changes made in articles. Copyright © Bryan House Publishing Limited. All Rights Reserved.

## **CONTENTS**

- 1 Comparative Analysis of Seismic Design Standards for Structures and Safety Standards for High-rise Concrete Building Structures**  
Abdihakim Osman Ali
- 6 Energy Saving Renovation Design in Modern Architecture: A Case Study**  
Faiz Ali Fahiz, Firoz Amiri, Munyoki Mwinzi
- 15 Monitoring of Surface Deformation in the Xi'an Coal Mine, Liaoyuan, Based on Time-Series InSAR**  
Renchao Zhang, Shengwu Qin, Jiasheng Cao, Yangyang Zhao
- 25 Research and Development of Laboratory Experiments on the Static Characteristics of Pile-Soil Contact Surfaces**  
Yiwei Liu, Lincong Zhou
- 32 Comparative Study on the Anti Sliding Performance of Circular and Rectangular Cross-section Anti-Sliding Piles**  
Xian Li, Zemin Xu, Xiang Li
- 38 The Role of Human Resource Management in African Construction Companies**  
Bipini Chandra Mallik
- 41 An Integrated Approach to Green and Bioclimatic Design in High-Rise Mixed-Use Buildings: A Case Study of Green Skyscrapers**  
Upasana Roy Barman
- 49 Review of Recent Developments in Tensile Properties of Engineered Geopolymer Composites**  
Yongming Lu, Yibing Liu, Yuting Zhang, Chenxi Juan, Yanting Cai, Shuting Yang, Zhongjun Hu
- 55 Sustainable Concrete Technology in the Field of Transmission Infrastructure: A Review**  
Neeraj Kumar Prajapati, Sita Gurjar, Hitesh Meena, Monalisha Biswal

