



CTU Journal of Innovation and Sustainable Development Can Tho University

ISSN 2588-1418 | e-ISSN 2815-6412



Vol. 17, No. 2 (July 2025)

CTU Journal of Innovation and Sustainable Development

ISSN 2588-1418, e-ISSN 2815-6412

Vol. 17, No. 2 (July 2025)

EDITORIAL BOARD

Editor-in-Chief

Tran Ngoc Hai

Deputy Editor-in-Chief

Tran Thanh Dien

Members

Tetsu Ando **Nguyen Trong Ngu**

Tokyo University of Agriculture and Technology, Japan *Can Tho University, Viet Nam*

Fu-Sung Chiang **Nguyen Nguyen Minh**

National Taiwan Ocean University, Taiwan *CSIRO, Australia*

Nigel K. Downes **Pham Thi Hong Nhung**

GIZ/CIM Integrated Expert *University of Foreign Languages, Hue University, Viet Nam*

Le Quoc Hoi **Kazufumi Osako**

National Economics University, Viet Nam *Tokyo University of Marine Science and Technology, Japan*

Atsushi Ishimatsu **Ngo Thanh Phong**

Nagasaki University, Japan *Can Tho University, Viet Nam*

Samir Kumar Khanal **Nguyen Thanh Phuong**

University of Hawaii at Manoa, USA *Can Tho University, Viet Nam*

Nguyen Dac Khoa **Yeong Yik Sung**

Can Tho University, Viet Nam *Universiti Malaysia Terengganu, Malaysia*

Phan Dinh Khoi **Yuji Tanaka**

Can Tho University, Viet Nam *Tokyo University of Marine Science and Technology, Japan*

Nguyen Ngoc Lam **Nguyen Thanh Thuy**

Institute of Oceanography, Viet Nam *VNU University of Engineering and Technology, Viet Nam*

Juan Boo Liang **Tran Trung Tinh**

Universiti Putra Malaysia, Malaysia *Can Tho University, Viet Nam*

Hoang Ngoc Long **Nguyen Hieu Trung**

Institute of Physics, VAST, Viet Nam *Can Tho University, Viet Nam*

Juan J. Loo **Tran Ngoc Tuan**

University of Illinois, United States *Shantou University, China*

Do Thanh Nghi **Phuong Hoang Yen**

Can Tho University, Viet Nam *Can Tho University, Viet Nam*

Nguyen Chi Ngon

Can Tho University, Viet Nam

CONTENT

Synthesis and cytotoxicity evaluation of thiazole conjugated amino acid derivatives <i>Huynh Nhut Linh, Nguyen Truong Giang, Nguyen Thi My Tien, Nguyen Pham Xuan Truc, Bui Minh Thi, Le Trong Hieu, Hong Vinh Quang, Do Minh Kiep, Hiroyuki Morita, and Bui Thi Buu Hue</i>	1	Optimizing aquaculture land-use: A case study in Dam Doi district, Ca Mau province, Viet Nam <i>Truong Chi Quang, Nguyen Van Chieu, Nguyen Hong Thao, and Pham Thanh Vu</i>	78
Vietnamese learners' mindsets about EFL speaking and role of demographic factors: A survey of university students <i>Nguyen Thi Bich Nhi, and Nguyen Van Loi</i>	8	Activated carbon synthesis from durian peel for ammonium ion adsorption <i>Pham Minh Tien, Truong Thi Kim Yen, Truong Thi Kim Tho, Le Thanh Phu, Tran Thi Bich Quyen, and Luong Huynh Vu Thanh</i>	91
From online learning to in-person teaching internship: Lived experiences of pre-service education students <i>James Liven B. Amoro, Ma. Kristel O. Amoro, and Gino G. Sumalinog</i>	23	Interrelationship of community and community-based enterprises: A case of cooperatives in Hue, Viet Nam <i>Doan Khanh Hung, and Tran Thi Nhung</i>	101
Hematological parameters and hypoglycemia in dogs with canine distemper virus and canine parvovirus infections: Study in veterinary clinics in Ho Chi Minh City, Viet Nam <i>Nguyen Vu Thuy Hong Loan, and Nguyen Thi Lan Anh</i>	34	The effect of customer satisfaction, green switching costs and alternative attractiveness on customer loyalty to green products in Viet Nam <i>Tang My Sang</i>	117
Examining EFL university lecturers' self-perceived assessment roles in classroom formative assessment: A study in the Mekong Delta of Viet Nam <i>Ly Thi Bich Phuong, and Phuong Hoang Yen</i>	41	Aligning teaching methods to learning outcomes at Can Tho University: Perspectives of undergraduate students <i>Huynh Thi Thuy Diem, Nguyen Nhat Thao Kieu Nhien, Mai Phuc Thinh, Le Van Nhuong, Huynh Anh Huy, and Dinh Minh Quang</i>	127
Development the gummy candies made from passion fruit (<i>Passiflora edulis</i>) and moringa leaf (<i>Moringa oleifera</i>) <i>Phan Nguyen Trang, Nguyen Phuong Anh, and Nguyen Thi Kieu Lam</i>	54	Entrepreneurship and innovation in business economics: A global bibliometric analysis from 2015 to 2024 <i>Anh-Tin Ngo</i>	136
Study on catalytic activity of bimetallic CuZn-ZIFs for Rhodamine B decomposition in the presence of potassium peroxymonosulfate <i>Tran Ba Huy, Nguyen Dinh Thanh, Nguyen Minh Nhut, Ho Ngoc Tri Tan, and Dang Huynh Giao</i>	66	Effects of foliar application of zinc sulfate on growth, yield and essential oil of Perilla (<i>Perilla frutescens</i> L.) and holy basil (<i>Ocimum sanctum</i> L.) <i>Ha-Tran Minh Dung, Le Quyen Cuoc, Nguyen Minh Nhut, Tran Van Thinh, and Nguyen Thi Thuy Lieu</i>	148

Study on fabrication and application of unsaturated polyester composite materials reinforced with Eucalyptus/Melaleuca wood shavings

Cao Luu Ngoc Hanh, Nguyen Thi Bich Thuyen, Dang Huynh Giao, Ngo Truong Ngoc Mai, Tran Nguyen Phuong Lan, and Lam Phuc Thong..... 158

The effects of different levels of vitamin E supplementation in the diet on the reproductive performance of crossbred rabbits using artificial insemination technique

Truong Thanh Trung, Pham Thi Cam Nhung, Nguyen Thi Kim Dong, and Tran Long Hai 169

About the Journal

1. CTU Journal of Innovation and Sustainable Development, ISSN 2588-1418, e-ISSN 2815-6412 is published according to the publication license No. 233/GP.BTTTT dated July 10, 2023 granted by the Ministry of Information and Communications.
2. The Journal publishes original research articles and review articles on all aspects of innovation and sustainable development globally in such disciplines, including Engineering Technology, Computer Science, Life Sciences, Economics and Management, and Educational Sciences.
3. Authors must follow the Journal's regulations and guidelines for preparing and submitting manuscripts at the website: ctujs.ctu.edu.vn
4. The Journal frequently receives manuscripts. After the peer-review process in accordance with the Journal's regulations, the approved manuscripts are published in full text at the website: ctujs.ctu.edu.vn
5. For further information and making a submission, please visit the Journal's website: ctujs.ctu.edu.vn

CTU Journal of Innovation and Sustainable Development

Address: 4th floor, Can Tho University Administration Building
Campus II, 3/2 street, Ninh Kieu ward, Can Tho city, Viet Nam.
Tel: (84-292) 3872 157; Email: ctujoisd@ctu.edu.vn



Publication license No. 233 dated July 10, 2023 granted by Ministry of Information and Communications.
Printed by Nhu Cuong Private Enterprise.
Address: No. 78, 30/4 street, Ninh Kieu ward, Can Tho city, Viet Nam.
Size 19 x 26 cm, printed and registered in the third quarter of 2025.

A decorative graphic consisting of several concentric hexagons, with the innermost being a solid light blue and the outer ones being outlines of varying shades of blue, creating a layered effect.

Address: 4th floor, Can Tho University Administration Building
Campus II, 3/2 street, Ninh Kieu ward, Can Tho city, Viet Nam.