# ENVIRONMENTAL SUSTAINABILITY Report 0727

Universiti Teknologi MARA Sarawak





Copyright@2022 by UiTM Green Centre and Sustainable Campus Committee Sarawak

### **Published By**

Perpustakaan Tun Abdul Razak Universiti Teknologi MARA Cawangan Sarawak Jalan Meranek, 94300 Kota Samarahan Sarawak

#### **Published Date**

31 October 2023

### **Chief Editor**

Ts. Dr. Nurzawani Md Sofwan

#### eISBN: 978-967-0828-66-4

#### Disclaimer

The work is subject to copyright. All rights are reserved by the Publisher, whether the whole or part of the material concerned, specifically the rights of translation, reprinting, reuse of illustration, recitation, broadcasting, reproduction on microfilms or in any other physical way, and transmission or information storage and retrieval, electronic adaptation, computer software, or by similar or dissimilar methodology now known or hereafter developed. The use of general descriptive names, registered name trademarks, service marks, etc. in this publication does not imply, even in the absence of a specific statement, that such names are exempt from the relevant protective laws and regulations and therefore free for general use. The publisher, the authors and the editors are safe to assume that the advice and information in this book are believed to be true and accurate at the date of publication. Neither the publisher not the authors or the editors give warranty, express or implied, with respect to the material contained herein or for any errors or commissions that have been made. The publisher remains neutral with regard to jurisdictional claims in published map and institutional affiliation.

Design and Visual Development by Ts Madeleine Elna Perreau

## **TABLE OF CONTENT**



Description Organisation Setup The Organisation's Core Values The Organisation's Core Business



## ENVIRONMENTAL QUALITY STANNDARDS

Enviromental Quality Standards		
Aspects Prioritisation	22	
Environmental Objectives and Targets	24	
Environmental Projects and Programmes	25	



## RECOGNITION

Green Sustainable Campus Awards	48
(AKLH) 2021 TIMES for Higher Education Awards	51
UiTM 2021	5.
10th Premier of Sarawak Environmental Award 2021/2022	52
Green Sustainable Campus Award	53
(AKKH) 2022	



## ENVIRONMENTAL Policy

Enviromental Policy	7			
Sustainable Development Goal Policy				
Energy Management Policy				
Bring-Your-Own-Container Policy				
Dissemination of Environmental Policy				
Relevancy to Current Global Status on				
the Environment				
Generation of Waste	12			
Wastes Treatement and Disposal	13			
Methods				
Potential Strategies & Planning				



## ENVIRONMENTAL PROGRAM AND IMPLEMENTATION

Green Initiatives Survey	28
Affordable Automated Smart Agriculture	33
System (AASAS)	
Carbon Footprint Monitoring	36
Portable Water Treatment Plant Project	38
Biological Treatment for Polluted Water	39
Establishing Memorandum of	39
Understanding with Industry Expert	
Research on Sewerage Treatment Plant	40
Establishinng Local Fertilizer From	
Poultry Project	40
Aquaponic Project	42
Bamboo Garden	43
Trainer For Green Projects For Suppliers	44
and Contractors in Sarawak	



Potential Environmental Impacts Enviromental Management Plan



## ENVIRONMENTAL REVIEW AND CONTINUAL IMPROVEMENT

Research on Internet of Things (IoT)				
Research on Water Treatment				
Monitoring of	f Electric	Usag	ge	.,
Hydroponic Project				
Air Quality				48
e-Reporting	System	of	Sustainable	49
Initiatives				

Conclusion List of Committed Writers Editorial Board Members 54 55 57

## TRAINER FOR GREEN PROJECTS FOR SUPPLIERS AND CONTRACTORS IN SARAWAK



**Physical Training Conducted** 

A group of lecturers from the College of Built Environment have been appointed by the Contractor and Supplier Development Unit (UPKP) under the Sarawak state government to train the local supplier and contractors pertaining the green building. This course is conducted face-to-face in the district in Sarawak and also online through the zoom application. The lecturers involved are lecturers with expertise in fields related to sustainable and green. The purpose of the lecturer's involvement as a trainer is to provide basic knowledge regarding green requirements in carrying out daily activities as a supplier and contractor. This activity to some extent has opened space for the lecturers to understand and listen to the opinions of the industry practitioners themselves regarding the implementation of the green concept. This partnership leads many opportunities for research and collaboration to help the industry and the state government to build capacity building in the implementation of this green



## **Editorial Board Members**

Honorary Patron Profesor Dato Dr. Jamil Haji Hamali

**Advisor** Yussri Sawani

**Chief of Editor** Ts. Dr. Nurzawani Md Sofwan

#### **Authors**

Ts. Dr. Nurzawani Md Sofwan Ts. Hemyza Budin Sr. Dr. Ahmad Faiz Abd Rashid Mohd Yazid Mohd Anas Khan Nur Afisha Yusuf Nur Ain Abu Bakar Wan Juliana Emeih Wahed Sr. Dr. Asmah Alia Bohari Affidah Morni Aiza Johari Ts. Madeleine Elna Perreau

### Contributors

Assoc. Prof. Dr. Hasmah Mohidin Assoc. Prof. Dr. Juferi Idris Muhamad Syukrie Abu Latip Hamzah Mohamad Ts. Dr. Siti Kartina Abdul Karim Adib Sarkawi Mohamad Husaini Mohd Saleh Muhammad Nazmi Nazarudin Mohd Razif Mohd Rathi



## ENVIRONMENTAL SUSTAINABILITY REPORT 202





### PERPUSTAKAAN TUN ABDUL RAZAK, UITM CAWANGAN SARAWAK

(online)