



UNIVERSITI
TEKNOLOGI
MARA



2023

JII CaS

**JOHOR
INNOVATION
INVENTION
COMPETITION
AND
SYMPOSIUM
2023**



"Innovation Inspires a Society
to be Critical and Creative"

JOHOR INNOVATION INVENTION COMPETITION AND SYMPOSIUM 2023



JOHOR INNOVATION INVENTION COMPETITION AND SYMPOSIUM 2023

"Innovation Inspires a Society to be
Critical and Creative"

Editors-in-Chief

**AHMAD KHUDZAIRI KHALID
NUR INTAN SYAFINAZ AHMAD**



الجامعة التكنولوجية
UNIVERSITI
TEKNOLOGI
MARA

**Cawangan Johor
Kampus Pasir Gudang**

2023



First Edition 2023

Copyright © 2023 Universiti Teknologi MARA Cawangan Johor, Kampus Pasir Gudang.

All extended abstracts published in this e-book have not been subject to JIICaS2023 peer review or check. The authors are responsible for the contents of their extended abstracts and warrant that their extended abstract is original, has not been previously published, and has not been simultaneously submitted elsewhere. The views expressed in the abstracts in this publication are those of the individual authors and are not necessarily shared by the editor.

All rights reserved. No part of this publication may be reproduced in any form or by electronic or mechanical means, including information storage and retrieval systems, or transmitted in any form or by any means, without the prior permission in writing from the Course Coordinator of College of Computing, Informatics and Mathematics, Universiti Teknologi MARA Cawangan Johor, Kampus Pasir Gudang.

e ISBN: 978-967-0033-17-4

**Editors-in-Chief: AHMAD KHUDZAIRI KHALID &
NUR INTAN SYAFINAZ AHMAD**

**Art & Cover Designer: DR. WAN MUNIRAH WAN MOHAMAD
& DR. NUR IDAYU ALIMON**

**Published in Malaysia by
Universiti Teknologi MARA Cawangan Johor
Kampus Pasir Gudang
81750 Masai**





Preface

In the name of Allah, the Almighty who gives us the enlightenment, the truth, the knowledge and with regards to Prophet Muhammad (peace be upon him) for guiding us to the straight path. We thank to Allah for giving us guidance and strength to write this e-book.

This e-book compiles the extended abstracts that submitted to Johor Innovation Invention Competition and Symposium 2023 (JIICaS2023), where JIICaS2023 is a virtual platform for all creative minds to share and present their invention and innovation. The extended abstracts are divided into two categories, which are Category A (Higher Educational Student/ Any Recognized Institutional Students in Malaysia) and Category B (Primary/ Secondary School Students / Special Education School Students in Johor). Each abstract gives a brief background on the innovation or project.

We hope that this e-book will help the readers to get to know the innovation done by the students from both categories and get some ideas to develop future innovation products.



REAL LIFE OCEAN MALL : MINECRAFT EDUCATION

Ahmad Zaquan bin Mohd Yuzair¹, Syaiful Amzar bin Samudin¹, Mohd Hairi bin Md Amzan¹
Harith Irfan bin Mohd Adam¹, Nur Intan Syafinaz binti Ahmad²

¹Sekolah Kebangsaan Saint Joseph Johor Bahru, 80100 Johor

²Universiti Teknologi MARA, Cawangan Johor Kampus Pasir Gudang 81750 Masai Johor

*emel: inasahmad85@gmail.com (Nur Intan Syafinaz binti Ahmad)

ABSTRACT

Minecraft Education has been developed to encourage students produce any idea and product based on their creativity. This product not only demonstrates the students' ingenuity, but it also aids in the resolution of societal issues such as hunger, climate change, education quality, and others. Using minecraft education, mall have been developed with real life ocean theme.

The floor of this mall are filled with sea creatures such as turtles, fish, coral, and others. There is also a food court on the premises that serves free food to those in need. This is one of the initiatives aimed at eradicating hunger among Malaysians. Aside from that, there is a garden with fruit trees on the roof that is open to the public. This fruit tree is yet another endeavor to combat hunger. This mall is entirely powered by solar panels. The solar panels are all positioned on the mall's roof. Solar panels are used to generate renewable energy and can help you save a lot of money in the long run. There is also a library that everyone can use. This library contains books for everyone, from toddlers to university students. There are also newspapers and novels for people of all ages. This is one method of encouraging young people to read rather than rely solely on technology. Finally, the construction of this mall may assist to alleviate hunger, revitalize people's energy, and inspire them to read a variety of books for lifelong learning opportunities.

Keywords: solar panel, sea life, library, zero hunger.

1.0 INTRODUCTION

Millions of students around the world has been using Minecraft Education whether in their history class coding class, mathematics class or any other subject. Currently this game provided 500 plus lesson challenges and curriculum to be explored by students and academicians. This game not only for creativity collaboration it also supports STEMS education.

Minecraft Education is an open-world game. This game are full of possibilities where players can use their imagination to create and build anything they want. This game can be played in group or per person. In group, students learn to solve problems together while exploring the amazing world created in Minecraft.

Impact of the learning outcome using Minecraft Education are students able to discover the power of game-based learning and engage students in their curriculum while building skills along the way.

In this creation, a mall has been built in a futuristic way. The mall not only features sea water animal but there is also garden in it. Electricity in the mall 80% are from solar panel source. Solar panel are built outside the mall to encourage the development of renewable energy. Every food stall inside the mall provided free food for needed people. Beside that on the

second floor garden are built and people can take any fruit inside the garden for them to eat. This is one of the ideas to achieve zero hunger among Malaysian people. On the first floor there are library section which provide variety of books from all ages. This is one of the idea to encourage Malaysian people to read a book and not only using their gadget.

2.0 OBJECTIVE

The objective of the study are

- to create a mall using renewable energy source
- to help zero hunger among Malaysian people
- to help increase quality education among Malaysian people from all ages.

3.0 DESCRIPTION OF CREATION

3.1 Sustainable Development Goals (SDG)

3 SDG been used in the creation

No	SDG	Description
1	Zero Hunger	Help the needy people by providing them with free food. They can get free food from all the stall in the mall and they can also pick their own fruits inside the provided garden.
2	Climate Action	Provide long term electric source with more efficient cost. Solar panel are install on the roof top of the mall. Since Malaysia are tropical country with higher chances of getting sun light everyday solar system are the most applicable way to encounter electricity problem. This opportunity will help the mall getting the renewable energy every day without any problem.
3	Quality Education	Library section are built in order to encourage people to read book and not depending on their gadget all the time. Variety of book are provided for all ages. This idea is to provide education to all Malaysian people from toddlers to adults.

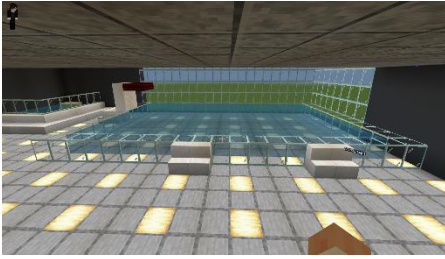
4.0 RESULTS



The floor of the mall are built with sea creatures inside. The purpose is to make people feel like they in the ocean with different type of coral fish, starfish, turtle and many others sea creatures.



Food stall are built in the ground floor to provide food for all visitors. Every food stall also provided free food for the needs.



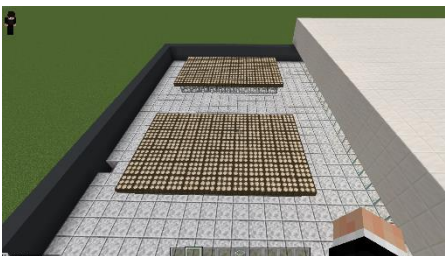
Swimming pool are built for kids and adults.



Library section that include variety of books for all ages



Playground are built beside library for kids to play while their guardians reading the books



Solar Panel at the rooftop of the mall that provide renewable energy for the mall



Garden are built for visitor to experience life in the garden. Visitor can also pick fruits their own.

5.0 CONCLUSION

As a conclusion, minecraft education are one of the platform to encourage students built any creation using their own creativity. The creation of the mall are not just for fun but also to help sustainable development goals that has been set by the government. Therefore, it is hope that this creation can be used to help others build a mall that not only for shopping and entertainment purpose but also beneficial to all Malaysian people from the wealthy family to the poor family.