

2022
UiTM KEDAH

InDeLib

15

RECONNECT AND

DISCOVER

Extended Abstract

International Innovation & Design in Library &
Information Science Competition (InDeLib2022)

Organized by

Faculty of Information Management
UiTM Kedah Branch



UNIVERSITI
TEKNOLOGI
MARA

Editors

Asmadi Mohammed Ghazali
Abd Latif Abdul Rahman



EXTENDED ABSTRACT

of

International Innovation & Design in Library &
Information Science Competition (InDeLib2022)

Editors

Asmadi Mohammed Ghazali

Abd Latif Abdul Rahman



Copyright © 2023, InDeLib2022

All rights reserved. No part of this publication may be reproduced, distributed or transmitted in any form by means, including photocopying, recording, digital scanning, or other electronic or mechanical methods without the prior written permission of the publisher, except in the case of brief quotations embodied in critical reviews and certain other non-commercial uses permitted by copyright law. For permission requests, please address to Universiti Teknologi MARA (UiTM) Kedah Branch.

First Edition 2023

Perpustakaan Negara Malaysia

e ISBN 978-967-2948-46-9



Editors:

Asmadi Mohammed Ghazali
Abd Latif Abdul Rahman

CONTENTS

1. DETECTIVE LOOKING CHART: PLUTCHIK EMOTION GAMES FOR KIDS THROUGH VARK MODEL FOR ASD CHILDREN	1
2. E-VIEW: LOW VISION READER ASSISTANT	4
3. WHERE IS YUYU?: DETECTIVE THEME AUGMENTED REALITY (AR) CHILDREN'S BOOK	7
4. DEVELOPMENT OF BIODEGRADABLE PLASTIC USING <i>CAULERPA LENTILLIFERA</i> 'S EXTRACT FOR A SUSTAINABLE ENVIRONMENT	9
5. DEVELOPMENT OF BIODEGRADABLE PLASTIC USING <i>METAPENAEUS INTERMEDIUS</i> 'S SHELL EXTRACT TOWARDS A SUSTAINABLE FUTURE	11
6. LITTLE MATES BUSY BOOK	13
7. PHYTOPLANKTON MAP	15
8. SAMUDERAMAPS: WATER QUALITY MANAGEMENT LIBRARY FOR CONSERVATION AND SUSTAINABLE USE OF MARINE RESOURCES AND ECOSYSTEMS	17
9. VIRTUAL REFERENCE CONSULTATION SERVICES	19
10. ZOOPLANKTON MAP	21
11. CASUAL BOOK WRAPPER	23
12. FRAMEWORK: VISUAL-SPATIAL: A MEDIATOR EFFECTS ON THE AUTISM SPECTRUM DISORDERS (ASD) ACHIEVEMENT IN SPEECH UTTERANCE	26
13. Sec-CompFY: SECURE COMPARTMENT FOR YOU	28
14. SMART LeoBOT	31
15. SMART SEIRS	33
16. IMPROVISE THE INTERLIBRARY LOAN SYSTEM: DEVELOPMENT OF INTERLIBRARY LOAN ONLINE SYSTEM (iNTeLS)	35
17. REDISCOVERING WISDOM THROUGH ANIMATED DA'WAH SERIES FOR CHILDREN	37
18. BATEEQ PACKERS	40
19. BAMBOO RAINDROP DRAINAGE SYSTEM	42
20. MY BOOK	44
21. IDOL: INTERACTIVE DIGITAL OUTDOOR LIBRARY	46
22. THE SNOWMAN	49
23. UUM IN4SHARE AS INFORMATION SHARING PLATFORM	52
24. INFOADVISER	54

IDOL: INTERACTIVE DIGITAL OUTDOOR LIBRARY

Masbiha Mat Isa¹, Siti Najah Raihan Sakrani², Mohamad Ameer Idham Othman³ & Faridatul Akma Ab Latif (Dr)⁴

¹ School of Architecture, Planning, and Design, College of Built Environment, UiTM Selangor Branch

² School of Communication and Media, College of Computing, Informatics and Media, UiTM Melaka Branch

³ PNC Design Sdn Bhd, Alam Nusantara, Shah Alam, Selangor

⁴ School of Architecture, Planning, and Design, College of Built Environment, UiTM Selangor Branch

masbihamatisa@gmail.com

Abstract

The design and location of public libraries in the twenty-first century should be flexible as an integral part of smart communities' digital, knowledge, and creative infrastructures. The Interactive Digital Outdoor Library (IDOL) aims to address the need for access to reading materials for pedestrians by uniquely combining library and outdoor services. IDOL structure acts as an outdoor reader's hub, with shelter, providing a small collection of seaters with distinctive designs, where an average of ten people can gather to retrieve the materials and read for a short time. The digital floor stands with interactive touch screens for e-books, music, movies, and news updates in an open structure emphasizing ease and safety. The access to e-books reduces issues of limited libraries and community centers, serves as an intervention to combat idleness, and introduces new outdoor community spaces. The concept is to bring inside the traditional library to the public outside, which inspired our theme, "Library as an Idol", greatly admired by new literacy communities. IDOL is available for 24-hour operation using a solar-powered system with book club specialties, allowing avid and interested readers to buy or subscribe to e-books with special discounts. Through advertising, the library will seek and attract funding from corporate organizations and brand owners whose products and services are aimed at the public. Literacy resources from private individuals' collections, writers' associations, and other concerned groups worldwide are invited and announced to the public via various IDOL communication channels such as social media and traditional media for e-book collections. Applying technological innovations and smart strategies in communities is an excellent attempt to improve government services and citizens' overall quality of life.

Keywords:

Interactive, outdoor design, library, e-book, digital.

Product Description

The IDOL concept design intention is to employ simple shelter construction methods for urban pedestrians and public transportation users (Figure 1). As an outdoor reader's hub, the shelter provides a small collection of seaters with distinctive designs, where an average of ten people can gather to retrieve the materials and read for a short time. IDOL operates for 24 hours using an eco-friendly solar-powered system to eliminate energy bills and reduce greenhouse emissions. The following are the product's specifications and design components:

- i. Structure dimensions of 5 meters width x 7 meters length x 5 meters height.
- ii. Floor components of a raised concrete platform.
- iii. Modern steel roof structure.
- iv. Plank-style wall for a luxurious feel to the interior.
- v. Electronics panels for e-book display interface.
- vi. Signage and a green roof with solar panels covering the entire platform.

- vii. Other components include interactive seating design, charging plugs, outdoor LED display screens for advertising, overhead lamps, and signage.



Figure 1: IDOL structure details and design components

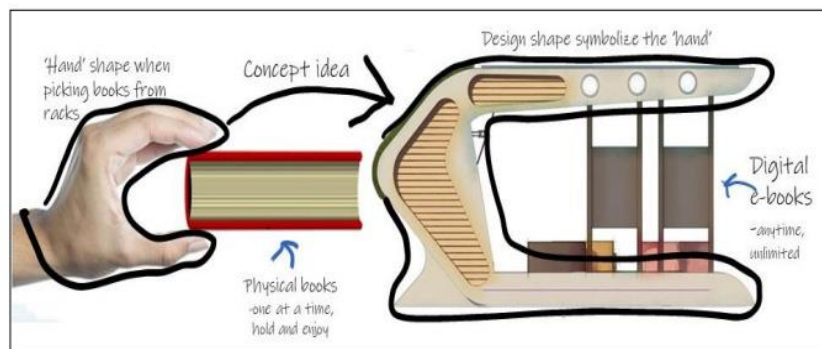


Figure 2: Concept idea development



Figure 3: Freestanding digital electronic panels for e-book display

Novelty and Uniqueness

The form of a person's hand as they selected and held books from the library shelves inspired the concept behind the design (Figure 2). Since it will be used outside, the most important aspect of the design is that it should be in the form of a shelter. The design goal is to determine the most functional and user-friendly structure and one that satisfies the criteria for attractiveness. The unique features of digital electronic panels for the e-book display interface are equipped with a full high-definition flat panel display screen that supports multiple interfaces. This allows users to select various types of e-books and media files such as music, images, movies, and newsletters using QR codes or drag-and-drop for ease of users (Figure 3). In addition, the digital signage can display price tags, current promotions, and hot sales, and it is compatible with Android and Windows operating systems.

Benefit to Mankind

IDOL concept is to bring inside the traditional library to the public outside, which inspired our theme of "Library as an Idol", which is greatly admired by new literacy communities, especially in the heart of city centers known for institutional, commercial, and entertainment districts. This project will help cultivate a culture of reading as a global trend awareness and inculcate groups of community members who share an interest in reading. With the advancement of communication technology, IDOL offers book club specialties that will enable avid and interested readers to purchase or subscribe to e-books at a special discount. People living in urban areas are very productive, and most pedestrians require a break to rest for a while and regain strength. The outdoor readers' hub manifests how easy access to e-books can alleviate the shortage of libraries and community centers, combat idleness, and open up new kinds of public spaces.

Potential Commercialization

Through advertising, IDOL will seek and attract funding from corporate organizations and brand owners that have products and services targeted at the public. For a fee, such companies and brand owners may advertise their products or services on the LED screen display. Literacy resources from private individuals' collections, writers' associations, and other concerned groups worldwide are invited and announced to the public via various communication channels such as social media and traditional media for e-book collections in IDOL e-book stores.