

e - Proceedings



Proceeding for International Undergraduates Get Together 2024 (IUGeT 2024)

"Undergraduates' Digital Engagement Towards Global Ingenuity"



Department of Built Environment Studies and Technology, College of Built Environment, UiTM Perak Branch

Co-organiser:

INSPIRED 2024. Office of Research, Industrial Linkages, Community & Alumni (PJIMA), UiTM Perak Branch

Bauchemic (Malaysia) Sdn Bhd

Universitas Sebelas Maret

Universitas Tridinanti (UNANTI)

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Echo Lounge

Nur Iwwani Hairuddin¹, Mohamed Nizam Abdul Aziz², Nur Aqila Sofea Mansor Musawir³ & Hanie Mahirah Muhammad Azman⁴

^{1,2,3,4}Programme of Architecture, Department of Built Environment Studies & Technology, College of Built Environment, Universiti Teknologi MARA (UiTM) Perak Branch, 32610 Seri Iskandar, Perak, Malaysia

*moham575@uitm.edu.my

ABSTRACT

Designing public spaces in educational institutions requires considering sustainability issues, the requirements of students, and sustainable practices. We highlight eco-friendly features by installing environmentally friendly resources that not only reduce environmental impact but also withstand weather conditions like rain, sun, and wind. Timber, also known for its sustainability, serves as the foundation for a retreat-like environment, having a natural aesthetic that encourages relaxation and creativity. Modular design enhances motion, allowing these spaces to adapt to changing needs. Successful public spaces should accommodate a variety of student activities, from studying to socializing, and provide comfortable seating that promotes community and interaction. These environments must resemble the university's environment, promoting a welcoming and functional sense of place. Functionality is essential, ensuring that the design aesthetics, sustainability, and modularity, higher education institutions can establish an efficient and environmentally friendly focus for their students, which encourages an environment on campus and the surroundings that facilitates academic as well as social engagement in a variety of scenarios.

KEYWORDS: Sustainability, modular design, community interaction, eco-friendly, top of form university environment

DESIGN DESCRIPTION

Inspired by the shape of a whistle, this public space blends functionality, sustainability, and beauty, making it a standout feature in any educational institution. Crafted from high-quality, weather-resistant wood, it radiates warmth and charm, with curved wooden slats creating a spacious, airy feel. The design is fully accessible, ensuring easy navigation for wheelchair users and promoting inclusivity. Practical features include bicycle parking, solar panels, Wi-Fi, and charging ports, turning it into a hub of convenience. A security camera adds safety and an information board keeps everyone updated. Visually, the design embraces the minimalist Scandinavian style with its organic shapes and natural materials. The whistle-inspired form is both striking and symbolic, aligning perfectly with the educational setting. Hanging plants enhance the biophilic design, creating a peaceful and refreshing atmosphere. In short, this structure thoughtfully combines material choice, functionality, and beauty, offering a versatile, sustainable, and welcoming public space that harmonizes with its natural surroundings.

NOVELTY AND UNIQUENESS

The design stands out with its unique whistle-inspired shape, which makes it not just a memorable feature but also a symbol of guidance fitting for an educational setting. It combines style and



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practicality by using weather-resistant wood and curved slats to create an inviting, open space. The structure is environmentally friendly, featuring solar panels that power essential amenities like Wi-Fi and charging ports. It's also designed with inclusivity in mind, offering wheelchair access and bicycle parking. The addition of hanging plants adds a touch of nature, enhancing the space's calming atmosphere. With its minimalist Scandinavian style, the design beautifully blends symbolism, functionality, and sustainability into a space that's both practical and inspiring.



Figure 1: Echo Lounge

BENEFITS TO MANKIND

The whistle-inspired public space design brings several key benefits that greatly enhance its value for people. One of the most notable aspects is its inclusivity. The structure is designed with accessibility features, ensuring that everyone, including those in wheelchairs, can navigate the space comfortably. This promotes social inclusion and equality, making it a welcoming environment for all. Sustainability is another major benefit. The use of solar panels and durable, natural materials shows a commitment to reducing environmental impact. By harnessing renewable energy, the design supports broader sustainability goals and reduces reliance on non-renewable resources. Convenience is also a priority. Features like bicycle parking, Wi-Fi, and charging ports make the space practical and user-friendly, encouraging sustainable transportation and keeping users connected. Safety is enhanced by the inclusion of a security camera, which helps create a secure environment. Aesthetically, the minimalist Scandinavian design, combined with biophilic elements like hanging plants, creates a calming and pleasant



atmosphere. This not only makes the space beautiful but also contributes to a sense of wellbeing. Lastly, the information board fosters community engagement by providing a central spot for announcements. Overall, the design thoughtfully balances functionality, sustainability, and user comfort.

COMMERCIAL POTENTIAL

The whistle-inspired public space design has strong commercial potential across several sectors. For educational institutions, it offers an attractive, functional, and inclusive option for campus enhancements, meeting the growing demand for modern, accessible facilities. Public sector projects, such as parks and community centers, could benefit from its sustainability and design, making it a candidate for government contracts and funding. In commercial real estate, the design can enhance shopping centers and office parks, adding value and appeal with its modern aesthetic and practical features. For corporate campuses, it offers a way to create engaging, green spaces that boost employee satisfaction and attract talent. Additionally, the design's focus on sustainability and user comfort could draw brand partnerships, particularly from companies invested in green technology and well-being. Winning design awards or gaining recognition could also open doors to more commercial opportunities, like consulting or design licensing. Overall, the design's blend of functionality, sustainability, and visual appeal makes it a versatile and marketable choice for various commercial applications.

CONCLUSION

This design successfully combines aesthetic innovation, functionality, and sustainability, making it a valuable addition to any educational institution or similar public space. The shape, inspired by a whistle, not only serves as a distinctive and symbolic architectural element but also provides practical advantages like easy access, convenience, and safety. Utilizing sustainable materials and technologies demonstrates a dedication to the environment, while the simplistic Scandinavian design and inclusion of elements from nature improve the overall experience and health of users. By bringing together these components, the design provides a flexible, interactive, and eco-friendly area that caters to contemporary requirements and promotes a welcoming and diverse atmosphere.

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We express our deepest gratitude to everyone who contributed to the success of our outdoor seating design. Special thanks to the design team for their creativity and innovation, and to the university's administration for their constant support and commitment to sustainability. We also thank the environmental consultants for guiding us in selecting eco-friendly materials and energy solutions. Lastly, we appreciate the student community for their invaluable feedback, which was key to shaping a design that truly meets their needs. This project is a collective effort, and we look forward to bringing it to life.

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Prof. Madya Dr. Nur Hisham Ibrahim Rektor Universiti Teknologi MARA Cawangan Perak

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