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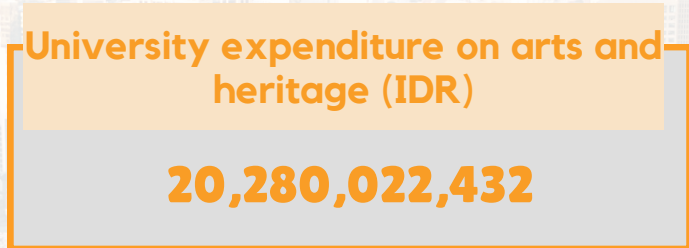
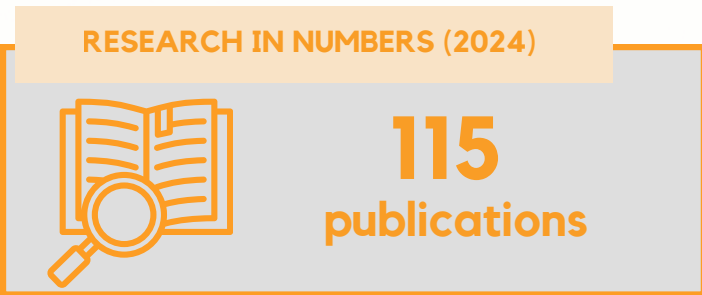


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“Cities and communities must themselves be sustainable. More and more of the world’s population lives in urban centres, and this is often the home of our universities too. Cities can be places of great innovation and opportunity, but they can also be home to intense poverty and inequality. The interaction between universities and their communities, urban and rural, needs to be a positive one that can last for generations.”

–THE Impact Rankings

11 SUSTAINABLE CITIES AND COMMUNITIES



Universitas Sebelas Maret (UNS) is committed to disseminating and implementing the values of SDGs 1-17 through a wide range of education, research, and community engagement programs. One example of this commitment is the dissemination of this research on

SDG 11



RETROFIT OF GREEN ARCHITECTURE THROUGH ADAPTIVE REUSE OF HERITAGE BUILDINGS IN SUSTAINABLE TOURISM MANAGEMENT



RESEARCH ARTICLE

The study shows that **adapting heritage buildings with green architecture** retrofits like energy, water, and material efficiency **can promote sustainable tourism** while preserving cultural heritage and **supporting a circular economy**.



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Retrofit of green architecture through adaptive reuse of heritage buildings in sustainable tourism management

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ABSTRACT
The adaptive reuse of cultural heritage buildings as tourist attractions is a growing trend. From an architectural point of view, this concept can be optimized with green architectural retrofit strategies, which help minimize construction waste and encourage environmental conservation. The challenge lies in technically implementing green architectural strategies to transform cultural heritage buildings to ensure safe and comfortable use as tourist destinations. This research uses method in-depth observations of several case studies to identify the subject's strengths and weaknesses through SWOT analysis. The findings from this analysis are used to develop strategies for managing cultural heritage buildings through green retrofit architecture. The research results provide detailed insights into the effectiveness of management practices based on previous research, addressing issues such as limited awareness and capacity, challenges in interpreting and managing cultural heritage, data management, costs, and inadequate knowledge. Research recommends applying green retrofit techniques such as energy efficiency, water and waste management, landscaping, building material, and indoor air quality to cultural heritage buildings. This approach aims to optimize and increase energy efficiency by revitalizing buildings through landscape designs that consider environmental conservation and climate change.

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11 SUSTAINABLE CITIES AND COMMUNITIES



MAKE CITIES INCLUSIVE, SAFE, RESILIENT, AND SUSTAINABLE

1 Fostering Arts, Heritage, and Sustainability Through Public Facilities at UNS

Universitas Sebelas Maret (UNS) demonstrates a strong commitment to arts, cultural heritage, and sustainability by **ensuring public access to facilities with historical, cultural, and social value**. Various facilities—including the G.P.H. Haryo Mataram Auditorium UNS, UNS Tower, UNS Inn, and UNS Library—serve not only as academic centers but also **as open spaces that encourage community engagement and cultural exchange**. Moreover, UNS is the first university in Indonesia to provide **six places of worship representing different religions, reflecting its commitment to religious tolerance, inclusivity, and social harmony**.



The university's network of facilities—including a hospital, medical center, stadium, sports hall, bookstore, Javanology pavilion, and multiple faculty auditoriums, further reinforces **its role as a hub for education, culture, and public well-being**. Each faculty building across disciplines such as cultural studies, law, engineering, psychology, medicine, economics, sports, teacher training, agriculture, vocational studies, information technology, sciences, social sciences, and arts is equipped with modern, accessible infrastructure designed to support both academic and community activities. Through these initiatives, **UNS integrates higher education with public access, cultural preservation, and sustainable development, positioning itself as a model institution for inclusive and environmentally conscious urban transformation**.



11 SUSTAINABLE CITIES AND COMMUNITIES



MAKE CITIES INCLUSIVE, SAFE, RESILIENT, AND SUSTAINABLE

2 Affordable and Sustainable Student Accommodation



Universitas Sebelas Maret (UNS) actively supports the achievement of SDG 11 by ensuring **access to decent, safe, and affordable housing for its students**. The university provides inclusive dormitory facilities at reasonable prices to create a supportive and conducive academic environment. These dormitories, located within the main campus area and branch campuses, offer basic yet adequate facilities, including lounges, cafeterias, and well-furnished rooms. By situating housing close to academic facilities, **UNS reduces students' need for daily commuting, thereby minimizing energy consumption and supporting integrated campus development**. This strategic planning enhances campus sustainability and contributes to the creation of an organized urban environment.

Additionally, UNS ensures housing affordability through a range of pricing options and scholarship schemes. Students can choose between single and shared rooms at monthly rental rates starting from IDR 500,000 to IDR 1,500,000. Recipients of financial aid, such as UKT or KIPK scholarships, may also use their funds to rent affordable off-campus housing near the university. Numerous boarding houses around the campus **provide additional accommodation options**, ensuring that financial constraints do not hinder students' access to education. This housing strategy reflects **UNS's commitment to social inclusion, equity, and sustainable urban development**.

