

Examining the Relationship Between SDG Principles and University Student Behaviour: Identifying the Most Influential Dimension

Wan Aqilah Shafiqah Wan Hanafi¹, Nur Syuhada Amran², Noorie Haryaniee Moulton^{3*} & Imron Sohsan⁴

^{1,2,3}Faculty of Administrative Science and Policy Studies, Universiti Teknologi MARA (UiTM), Malaysia

⁴Faculty of Humanities and Social Science, Khon Kaen University, Thailand

Corresponding Author: noori639@uitm.edu.my

Abstract

The Sustainable Development Goals (SDGs) provide a universal framework for advancing a more sustainable future through five guiding principles: People, Planet, Prosperity, Peace, and Partnership. University students play a vital role in translating these principles into behavioural practices that support sustainability within academic and societal contexts. This study examines the relationship between the SDG principles and students' behaviour, and further identifies the most influential principle shaping their sustainable practices. A quantitative approach was employed, with data collected through questionnaires administered to 341 undergraduate respondents using convenience sampling. Correlation analysis revealed that all five principles demonstrated a significant and positive relationship with students' behaviour, with partnership ($r = 0.688$) and peace ($r = 0.686$) showing the strongest associations. Regression analysis further indicated that peace ($\beta = 0.317$, $p = 0.000$) was the most influential principle in predicting students' behavioural practices. This highlights the pivotal role of peace in fostering cooperation, conflict resolution, and social responsibility among students. The findings underscore the importance of embedding SDG values into higher education to promote behavioural change, while also emphasising the need for collaboration among governments, NGOs, and educational institutions to strengthen SDG oriented initiatives. Practically, these results provide valuable guidance for universities in prioritising peace-focused educational programs, student engagement activities, and curriculum design to encourage sustainable behaviours. By identifying the most impactful principle, this study contributes new insights into strategies that align higher education with the broader global sustainability agenda.

Keywords: Sustainable Development Goals (SDGs); Student behaviour; Higher education; Peace; Sustainability practices; Social responsibility

INTRODUCTION

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The United Nations Sustainable Development Goals (SDGs), adopted in 2015, present a global blueprint for achieving a better and more sustainable future by 2030. Comprising 17 goals and underpinned by five key principles which are people, planet, prosperity, peace and partnership with the SDGs aim to mobilize governments, institutions, and individuals toward social, environmental and economic development (Afroz & Ilham, 2020; SDG, 2021). This universal agenda was built on the Millennium Development Goals (MDGs), which focused on eradicating poverty and improving education and health outcomes. Unlike the MDGs, however, the SDGs are

broader in scope and applicability, promoting inclusivity across both developed and developing nations (Woodbridge, 2015).

Malaysia, as one of the 193 participating nations, has taken several steps to incorporate the SDGs into national policy and development frameworks. According to the Department of Statistics Malaysia (DOSM), the country met 52% of SDG indicators in 2019, up from 41% in 2018 (The Star, 2021). Nonetheless, efforts to institutionalize the SDGs at the grassroots and higher education levels remain fragmented. As educational institutions play a crucial role in shaping future leaders, universities have a responsibility to embed sustainability principles into their curricula, campus operations, and student life. Malaysia's efforts toward achieving the Sustainable Development Goals (SDGs) reflect broader sustainability initiatives occurring across the ASEAN region. Similar to neighbouring countries such as Indonesia, Thailand, and the Philippines, Malaysia continues to face challenges related to sustainable development implementation, particularly in translating sustainability awareness into consistent behavioural practices among university students. Higher education institutions play a significant role in supporting SDG implementation by promoting sustainability education, awareness, and student engagement initiatives. According to Unterhalter and Howell (2021), tertiary education institutions in developing countries serve as important platforms for advancing SDG related knowledge and fostering sustainable societal transformation despite institutional and resource-related challenges. In the ASEAN context, universities are increasingly expected to strengthen collaborative partnerships, sustainability-oriented curricula and student participation to accelerate progress toward achieving the SDGs.

Despite national and global efforts to promote the SDGs, awareness and behavioural engagement among university students remain inconsistent and under-researched. A critical barrier to Education for Sustainable Development (ESD) lies in the students' limited understanding of sustainability concepts and the practical implications of the SDGs. Many students are either unaware of what the SDGs represent or lack the necessary guidance to translate awareness into action. Studies indicate a partial disconnect: for instance, a survey at Universiti Malaysia Kelantan revealed that although 58% of science students were aware of the SDGs, 42% were not. Interestingly, all participants recognized climate change as a critical issue, suggesting fragmented awareness of sustainability themes (Ang & Liang, 2021). Additionally, Raja Nur Izny Kamaliyah et al. (2024) argue that an individual's behavioural intentions such as recycling or conserving resources are shaped by attitudes, social norms, and perceived

control over actions. A positive attitude alone, therefore, does not guarantee sustainable behaviour without adequate knowledge and institutional support.

Combining this issue are institutional constraints such as limited funding, lack of administrative leadership, and insufficient incentives for green initiatives. Financial disparities between urban and rural campuses further exacerbate access to quality sustainability education (Chow, 2023). Universities also face challenges in promoting campus sustainability due to regulatory gaps and high operational costs (Beringer, 2007; Yusoff et al., 2021). As a result, these structural and behavioural limitations hinder the full integration of SDG principles in higher education.

This study is conducted to examine the relationship between the Sustainable Development Goals (SDGs) and university students' behaviour, with particular focus on the five core principles: people, planet, prosperity, peace, and partnership. The objectives of this research are twofold. First, it seeks to determine the relationship between each of the five SDG principles and students' behavioural practices. Second, the study aims to identify the most influential SDG principle in shaping sustainable behaviours among students.

In addressing these objectives, the study poses the following research questions, is there a significant relationship between the five SDG principles which are people, planet, prosperity, peace, and partnership and students' behaviour?, and which SDG principle demonstrates the strongest influence on students' behaviour? By exploring these questions, the study provides insights into the extent to which sustainability principles are reflected in students' practices and highlights which dimensions most effectively drive behavioural engagement. The findings are expected to inform higher education institutions in embedding sustainability within their academic environment, thereby fostering behavioural change and advancing the broader goals of sustainable development. Therefore, the findings of this study contribute not only to the local context of UiTM Seremban 3 but also to the broader regional discourse on sustainability practices within higher education institutions in developing countries.

LITERATURE REVIEW AND FRAMEWORK

The literature review would explain, summarise, assess, and clarify past studies. This research, it's reviewed on the relationship between the Sustainable Development Goals (SDGs) and students' behaviour based on five principles which were people, prosperity, planet, peace, and partnership. The literature review started with the definition of Sustainable Development Goals (SDGs), students' behaviour, and five principles of the Sustainable Development Goals (SDGs) which were people, prosperity, planet, peace, and partnership

Definition of Sustainable Development Goals (SDGs)

The Sustainable Development Goals (SDGs), which comprise 169 targets and 232 specific indicators, have previously called for a significant transformation of human, social, and environmental development goals (Moyer & Hedden, 2020; Griggs et al., 2013, UNGA, 2015). The Sustainable Development Goals (SDGs) covered five dimensions which are people, planet, prosperity, peace, and partnership where the Sustainable Development Goals (SDGs) would spur action over the next fifteen years in critical fields for humankind and the environment (Ministry of Economy, 2021). The Sustainable Development Goals (SDGs) are a framework for creating a better and more sustainable future for everyone. All countries and stakeholders, including governments, civil society, the commercial sector, and individuals, must participate in implementing the Sustainable Development Goals (SDGs) into action. Each goal sets out particular objectives to accomplish by the year 2030 (United Nations, n.d.). These objectives encompass a diverse array of topics such as poverty alleviation, hunger eradication, healthcare improvement, educational advancement, climate action, gender equity, water and sanitation provision, energy accessibility, environmental conservation, and the promotion of social justice

Student Behaviour

An individual's behaviour was reliant on behavioural intention, which consists of three elements: attitude, subjective standards, and perceived behavioural control (Ajzen, 1988). On the contrary sustainability literacy was defined as the knowledge, abilities, and attitudes that enable individuals to become profoundly dedicated to creating a sustainable future while also aiding in making educated, effective decisions (United Nations, 2018).

In turn, the students' attitudes and behaviours gave a clear picture of how their ideas and actions might affect the accomplishment of the Sustainable Development Goals (SDGs) (Duong, 2023). The intellectual and emotional dimensions of students learned were the key mechanisms by which they acquire information, attitudes, and behaviours related to sustainability (Shephard, 2008). Moreover, Education for Sustainable Development (ESD) and environmental education had demonstrated that improving learners' sustainability awareness leads to a modification of their behaviours (Alsaati et al., 2020). The understanding and attitudes towards the Sustainable Development Goals (SDGs) was equal and included. Yet, having trouble comprehending the Sustainable Development Goals (SDGs) might deter their accomplishment (Omisore et al., 2017). Thus, uncertainty about the Sustainable Development Goals (SDGs) might hinder progress towards the students. Other than that, education was crucial for sharing knowledge and fostering long-term development (Nur Fadhlina et al., 2023). Developing the right awareness, values, and attitudes was vital for long-term success. Higher education institutions play a critical role in attaining the Sustainable Development Goals (SDGs) by transferring knowledge and information.

Principles of the Sustainable Development Goals (SDGs)

As the globe develops at a rapid rate, governments thought that equitable and sustainable growth is required for the benefit of both individuals and the environment. The globe joined together in 2015 to develop the 2030 Agenda, which aimed to create a safer, healthier, and more wealthy future for all. The Sustainable Development Goals (SDGs) integrate and balance the five focus areas into five categories which are named five principles (5Ps): people, planet, prosperity, peace, and partnership.

(a) People

Global progress on SDG 1 has been notable, with extreme poverty rates in developing countries falling from nearly 50% in 1990 to 14% in 2015 (Max, 2017). However, reductions have been uneven, and structural barriers persist (Fehling et al., 2013). Education plays a critical role in poverty alleviation; basic literacy could lower global poverty by 12% (Education and Academia Stakeholder Group, 2017), while improved schooling and teacher training offer long-term solutions (Filho et al., 2021). In Malaysia, poverty declined sharply from 52.4% in 1970 to 3.8% in 2009 (Sharifah

Rohayah & Khoo, 2017), yet over 114,000 households remain in extreme poverty (Bernama, 2023).

SDG 2 highlights persistent hunger, with 828 million people undernourished and 3.1 billion unable to afford a healthy diet in 2021, worsened by global crises such as COVID-19 and the Ukraine conflict (FAO, 2022). Rising food costs and systemic inefficiencies drive insecurity (Fanzo et al., 2021; Herforth et al., 2020). Malaysia recorded a moderate hunger level, ranking 56th in the 2023 Global Hunger Index. At the same time, health and well-being (SDG 3) have become central, as COVID-19 not only strained health systems but also threatened SDG 1 by potentially pushing millions into extreme poverty (IFPRI, 2020).

Gender equality (SDG 5) remains a cross-cutting challenge, essential for advancing education, health, and economic participation. Malaysia ranks 103rd of 146 nations in the Global Gender Gap Index 2022, with a score of 0.681 (UNDP, n.d.), reflecting ongoing barriers to women's empowerment. These interlinked challenges across poverty, hunger, health, and gender highlight the need for integrated approaches to sustain SDG progress by 2030.

(b) Planet

The Planet dimension of the SDGs stresses the urgent need to protect ecosystems, promote sustainable resource use, and address climate change for the well-being of present and future generations (Ali, 2023). Goals under this category include clean water and sanitation (SDG 6), responsible consumption and production (SDG 12), climate action (SDG 13), life below water (SDG 14), and life on land (SDG 15). Together, they reflect the global commitment to balancing human development with environmental sustainability.

Urbanization poses significant sustainability challenges. Cities host 55% of the world's population, generate 85% of GDP, and account for 75% of greenhouse gas emissions (Kufeoglu, 2022). Achieving SDG 11 Sustainable Cities and Communities requires improved governance, public transport, climate resilience, and cultural preservation. Similarly, sustainable consumption and production (SDG 12) remains underdeveloped, with major research gaps in consumer behavior, waste management, and resource efficiency (Chan et al., 2018).

Climate change intensifies inequality, leaving disadvantaged groups up to 70% more vulnerable to its impacts (Calzadilla, 2020). This highlights the importance of climate justice, ensuring equitable distribution of environmental benefits and burdens. Marine ecosystems face parallel threats, with over 30% of global fish stocks overexploited (Sturesson et al., 2018), underlining the need for international collaboration and technological innovation for biodiversity conservation. On land, forests play a central role by conserving biodiversity, sequestering carbon, and supporting the livelihoods of 1.6 billion people (Sayer et al., 2019). Sustainable forest management is thus vital to advancing both environmental and socio-economic goals.

(c) Prosperity

The prosperity dimension of the SDGs emphasizes inclusive and sustainable economic growth that ensures well-being for all. Sustainable development is critical for ending poverty and inequality, which remain among the most pressing global challenges (Green Thestral, 2023; The Global Citizen Academy, 2021). This category aligns with five goals: affordable and clean energy (SDG 7), decent work and economic growth (SDG 8), industry, innovation, and infrastructure (SDG 9), reduced inequalities (SDG 10), and sustainable cities and communities (SDG 11). Together, these goals envision a prosperous future grounded in equity, resilience, and innovation.

Research has highlighted significant gaps in achieving prosperity-related SDGs. In 2021, nearly 20% of the global population still lacked access to electricity, with Sub-Saharan Africa most affected. While renewable energy is expanding, fossil fuels remain dominant, calling for stronger international cooperation to achieve universal clean energy access by 2030 (Kufeoglu, 2022). Studies on SDG 8 emphasize that economic growth has not fully addressed gender inequalities, particularly the undervaluation of women's unpaid care work (Kreinin & Aigner, 2021). This suggests the need for policies that integrate social equity with growth.

Further studies underline the role of innovation and inclusivity in sustainable prosperity. SDG 9 research points to global disparities in R&D investment, with billions lacking access to basic services such as sanitation and electricity (Kufeoglu, 2022). National initiatives like China's technology competitions and Germany's advanced materials research—illustrate how innovation can drive sustainability (Kufeoglu, 2022). At the same time, SDG 10 stresses reducing inequalities through inclusive policies and

stronger international cooperation, addressing disparities across wealth, gender, and social status (Kufeoglu, 2022). Collectively, these findings reinforce the urgency of integrated strategies to ensure prosperity that is both equitable and sustainable.

(d) *Peace*

The peace dimension of the SDGs focuses on fostering just, inclusive, and stable societies through strong institutions and equitable governance (SDG 16). Conflicts, corruption, and weak governance threaten cohesion, impede growth, and erode trust in systems (Green Thestral, 2023; Ali, 2023). Peace is not merely the absence of violence but the establishment of communities that guarantee justice, accountability, and inclusion. As emphasized by The Global Citizen Academy (2021), sustainable development cannot exist without peace, and peace cannot be sustained without development.

Prior studies highlight persistent gaps in achieving SDG 16. For example, global assessments reveal that only 30% of nations have effective anti-corruption policies, and just 40% maintain comprehensive legislative frameworks to combat corruption (Suganya, 2022). Although progress has been made in reducing violence and expanding access to justice, fragile governance structures remain a critical obstacle. Research on Asian and Pacific contexts shows similar trends, with some advances in lowering violence rates but persistent weaknesses in anti-corruption enforcement (Van Halderen et al., 2019).

Further evidence underscores the importance of strengthening institutions and the rule of law. Kufeoglu (2022) notes that only 40% of the global population has access to an independent judiciary, while 55% of countries lack robust anti-corruption mechanisms. These findings reinforce the need for international cooperation, institutional reforms, and accountability measures to ensure SDG 16 is fully realized. Without tackling corruption and governance deficits, long-term peace and inclusive development remain out of reach.

(e) *Partnership*

Partnerships are central to achieving the Sustainable Development Goals (SDGs), as emphasized in Goal 17. Multi-stakeholder collaboration mobilizes knowledge, skills, technology, and financial resources to address complex global challenges (The Global Citizen Academy, 2021; Ali, 2023). Governments, corporations, civil society, academia,

and individuals must work together to create inclusive and sustainable solutions. Effective partnerships enable the pooling of diverse expertise, fostering strategies that can tackle issues no single actor could resolve alone (Green Thestral, 2023).

Research highlights both challenges and opportunities in partnerships. In South Africa, language and geographical barriers hindered collaboration across stakeholders in advancing health research (Harwood et al., 2021). Yet, positive examples such as the *Positive Impact Events* international partnership demonstrate the potential of inclusive knowledge-sharing to improve SDG outcomes (Filho et al., 2021). Partnerships among higher education institutions have also been shown to strengthen research capacity in low-income nations, helping overcome barriers to SDG progress (Harwood et al., 2021).

Previous studies further underscore the role of local organisations and governance structures in sustaining partnerships. Local actors serve as accelerators of community sustainability efforts by investing resources and mobilising participation (Macdonald et al., 2018). At the global level, meta-governance through accountability, participation, and transparency has been found to improve the quality and effectiveness of partnerships, directly influencing SDG implementation (Sondermann & Ulbert, 2021). Strengthening such mechanisms ensures partnerships remain impactful, equitable, and resilient.

Conceptual Framework

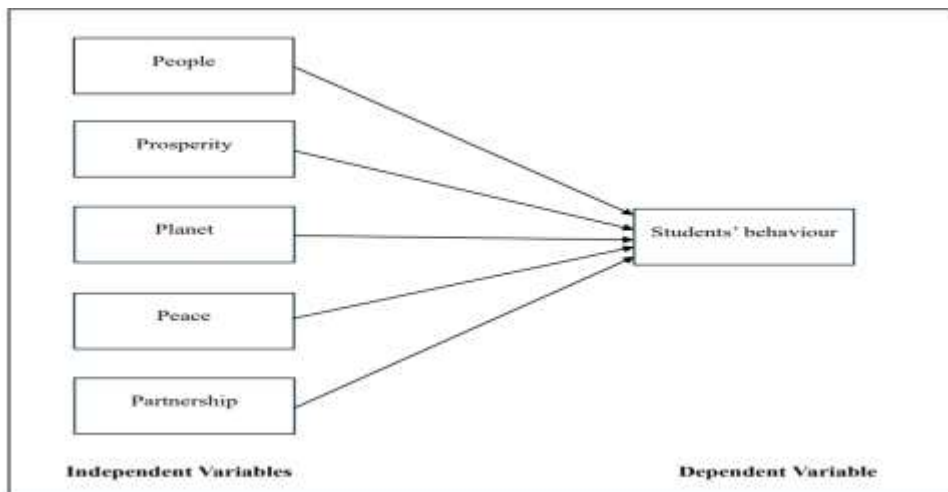


Figure 1: Conceptual Framework

Figure 1 illustrates the conceptual framework linking the Sustainable Development Goals (SDGs) with university students' behaviour. The framework identifies five independent variables such as people, planet, prosperity, peace, and partnership which represent the core SDG dimensions expected to influence students' behavioural patterns. Independent variables are those that exert influence on other factors (Andrade, 2021), while the dependent variable is defined as the outcome being affected. In this study, students' behaviour is positioned as the dependent variable. The framework assumes that the integration of SDG principles into awareness, values, and practices contributes to shaping students' attitudes and behavioural choices. By examining the relationships between these five SDG dimensions and behavioural outcomes, the study seeks to determine which dimensions exert the strongest influence. This will allow for a better understanding of how sustainability values translate into student actions, thereby providing practical insights for education, policy, and institutional practices.

RESEARCH METHODOLOGY

This study employed a cross-sectional research design with a quantitative approach to examine the relationship between the Sustainable Development Goals (SDGs) and students' behaviour. A cross-sectional survey was selected as it allows data to be collected at a single point in time, addressing multiple objectives simultaneously while remaining cost-effective and efficient (Simkus, 2023). The primary data was collected using structured questionnaires designed to capture students' perceptions and attitudes toward the SDG dimensions.

The study population consisted of undergraduate students from a faculty of administrative sciences. Based on Krejcie and Morgan's (1970) sampling table, a minimum sample size of 341 respondents was determined from a population of approximately 3,120 students. Convenience sampling was applied, whereby questionnaires were distributed to students who were readily available and willing to participate (Edgar & Manz, 2017). This method ensured practical data collection while minimizing time and resource constraints.

The research instrument was adapted from prior studies (Afroz & Ilham, 2020; Odoom et al., 2024; Goubran & Cucuzzella, 2019; Natasya et al., 2019). It consisted of seven sections: (A) demographic information, (B–F) items measuring the five SDG dimensions (people, prosperity, planet, peace, and partnership), and (G) items measuring

students' behaviour. Responses were recorded on a five-point Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree). The bilingual questionnaire (English and Malay) was designed to enhance accessibility and comprehension for all respondents.

FINDINGS AND DISCUSSION

Findings for Demographic Profile

Table 1:
Demographic Profile

Profile	Category	Frequency	Percentage (%)
Gender	Female	279	79.7
	Male	71	20.3
Age	21 years old and below	218	62.3
	22 years old and above	132	37.7
Current Academic Level	Bachelor's Degree	207	59.1
	Diploma	143	40.9
Program	AM110	100	28.6
	AM120	57	16.3
	AM225/AM235	34	9.7
	AM226/AM236	27	7.7
	AM228/AM238	132	37.7

Table 1 presents the demographic profile of the respondents. A majority of the students were female (79.7%), while only 20.3% were male. Most respondents were aged 21 years and below (62.3%), whereas 37.7% were 22 years and above. In terms of academic level, 59.1% were pursuing a Bachelor's degree and 40.9% were diploma students. With respect to academic programs, the largest proportion of respondents were from AM228/AM238 (37.7%), followed by AM110 (28.6%), AM120 (16.3%), AM225/AM235 (9.7%), and AM226/AM236 (7.7%). This indicates that the sample is dominated by young female undergraduates, which may shape the overall findings by reflecting perspectives that are more representative of early-stage university students.

Findings for Objective 1: To determine the relationship between each of the five SDG principles and students' behavioural practices

Table 2:

Pearson Correlation between the Five Principles of SDGs and Students' Behaviour

SDG Principle	Correlation Coefficient (r)	Sig. Value (p)	Relationship Strength
People	0.604	0.000	Moderate
Prosperity	0.650	0.000	Strong
Planet	0.650	0.000	Strong
Peace	0.686	0.000	Strong
Partnership	0.688	0.000	Strong

The Pearson correlation analysis revealed significant and positive relationships between all five SDG principles and students' behaviour: people ($r = 0.604$, $p < 0.001$), prosperity ($r = 0.650$, $p < 0.001$), planet ($r = 0.650$, $p < 0.001$), peace ($r = 0.686$, $p < 0.001$), and partnership ($r = 0.688$, $p < 0.001$). These findings indicate that students' sustainable behaviour at UiTM Seremban 3 Campus is strongly associated with the principles of the SDGs. For the people principle, the significant correlation supports prior research showing that efforts to eliminate poverty, promote education, ensure gender equality, and improve health are central to shaping behaviour (Green Thestral, 2023). With goals such as poverty alleviation (Goal 1), quality education (Goal 4), and gender equality (Goal 5), this principle reinforces the importance of people-centred strategies in fostering sustainable student behaviour.

The relationship between prosperity and students' behaviour ($r = 0.650$) reflects the emphasis on inclusive economic development. Green Thestral (2023) highlighted that sustainable economic growth is essential to reducing inequality, while Kreinin and Aigner (2021) pointed out limitations of growth-focused measures in addressing gender disparities. Under the prosperity principle, goals such as Decent Work and Economic Growth (Goal 8) and Reduced Inequalities (Goal 10) underline the role of economic empowerment in shaping behaviour. For the planet principle ($r = 0.650$), the findings affirm that environmental responsibility strongly influences sustainable behaviour. Ali (2023) stressed that protecting ecosystems is crucial for future generations, while Sturesson et al. (2018) underscored the role of research and innovation in safeguarding biodiversity. Goals such as Climate Action (Goal 13) and Life on Land (Goal 15) demonstrate how environmental stewardship fosters behavioural change among students.

The strong relationship between peace and students' behaviour ($r = 0.686$) highlights the role of stability and social harmony in shaping conduct. Ali (2023) noted that peace contributes to long-term growth, while Green Thestral (2023) observed that corruption and weak governance undermine development. Goal 16 (Peace, Justice, and Strong Institutions) underscores that peace-oriented environments positively influence behaviour by ensuring justice and accountability. Lastly, partnership recorded the strongest correlation ($r = 0.688$), supporting the view that collaboration drives sustainable action. The Global Citizen Academy (2021) emphasized the importance of partnerships at all levels, while Macdonald et al. (2018) showed how local organizations accelerate sustainability through resource-sharing. Goal 17 (Partnerships for the Goals) demonstrates how collective efforts inspire behavioural change.

Findings for Objective 2: To identify the most influential SDG principle in shaping sustainable behaviours among students.

Table 3:
Multiple Regression Test Result

Variable	Beta (β)	Sig. (p)	Tolerance	VIF
People	-0.003	0.972	0.262	3.818
Prosperity	0.276	0.000	0.282	3.541
Planet	-0.118	0.222	0.146	6.848
Peace	0.317	0.000	0.185	5.411
Partnership	0.310	0.000	0.190	5.264
$R^2 = 0.532$				
Adjusted $R^2 = 0.525$				
$F = 78.113$				
$p < 0.001$				

The results revealed a strong and significant relationship between the five principles of the Sustainable Development Goals (SDGs), people ($r=0.604$, $p=0.00$), prosperity ($r=0.650$, $p=0.00$), planet ($r=0.650$, $p=0.00$), peace ($r=0.686$, $p=0.00$), and partnership ($r=0.688$, $p=0.00$) and students' sustainable behaviour. These findings indicate that each principle plays a meaningful role in shaping students' awareness and actions toward sustainability. Among these principles, peace and partnership emerged as the strongest influencers, supported by the regression analysis which identified prosperity ($\beta=0.276$, $p=0.000$), peace ($\beta=0.317$, $p=0.000$), and partnership ($\beta=0.310$, $p=0.000$) as significant predictors of students' behaviour. This demonstrates that beyond environmental and social dimensions, the values of inclusivity, collaboration and stability are central in guiding youth towards sustainability oriented practices.

The findings are consistent with existing literature. For instance, Ali (2023) emphasized that peace promotes societal stability and long-term growth, while Green Thestral (2023) noted that conflicts, corruption, and poor governance systems undermine collective development efforts. This supports the current study's finding that peace plays a critical role in shaping student behaviour. Similarly, the role of partnerships highlighted in this study reflects The Global Citizen Academy's (2021) argument that collaboration among governments, communities and institutions is essential in driving sustainable transformation. Prior work by Macdonald et al. (2018) also reinforces the contribution of local organizations in advancing sustainability through partnerships at the community level. The emphasis on prosperity also aligns with Kreinin and Aigner (2021), who pointed out the importance of economic inclusivity and decent work in shaping equitable societies. Together, these findings confirm that the SDG principles are not only conceptually interlinked but also practically influential in encouraging positive behavioural change among students.

This finding suggests that collaborative engagement between universities and external stakeholders may play an important role in strengthening sustainability awareness and participation among students. In the context of higher education institutions, partnerships with government agencies, private sectors, non-governmental organizations and local communities may help address common barriers to SDG implementation, including limited funding, insufficient institutional support and regulatory constraints. Through collaborative initiatives such as sustainability campaigns, community engagement programs, and interdisciplinary projects, universities may create a more supportive environment for fostering sustainable behaviour among students.

CONCLUSION

This study examined the relationship between the five Sustainable Development Goal (SDG) principles such as people, prosperity, planet, peace, and partnership and student behaviour at UiTM Seremban 3. The results confirm that all five principles significantly shape behaviour, while Peace, Partnership, and Prosperity emerged as the most influential drivers. These findings highlight the central role of social stability, cooperation, and equitable development in fostering sustainable student practices.

However, the study encountered certain limitations. One limitation of this study is the use of convenience sampling, which may introduce selection bias and limit the generalizability of the findings. Since the respondents were primarily drawn from Administrative Science students at UiTM Seremban 3, the results may not fully represent the behavioural perspectives of university students from other academic disciplines or institutions. Future research should consider employing stratified random sampling across multiple faculties and universities to improve sample representativeness and external validity. Furthermore, the sample consisted predominantly of female respondents (79.7%). Previous studies have indicated that gender differences may influence sustainability awareness and pro-environmental behaviour, with female students often demonstrating stronger sustainability oriented attitudes. Therefore, the gender imbalance may have affected the overall findings and should be interpreted with caution. Limited academic resources, particularly within the Malaysian context, constrained deeper comparative analysis with prior research.

Future studies should employ more systematic sampling methods such as random or stratified sampling to improve validity. Expanding the scope to include students from multiple campuses and institutions nationwide would provide richer and more representative insights. Strengthening collaborations between academia, industry, and policymakers is also recommended to deepen the study of SDGs and broaden their application in higher education and society.

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Author contributions

Wan Aqilah Shafiqah Wan Hanafi and Nur Syuhada Amran contributed to data collection, data analysis, and drafting of the manuscript also literature review, methodology development, and data interpretation.

Noorie Haryaniee Moulton (corresponding author) was responsible for supervision, critical revision of the manuscript, and overall project coordination.

Imron Sohsan contributed to final review of the manuscript.

Conflict of interest

The authors declare no conflict of interest with respect to the research, authorship, and/or publication of this article. All authors affirm that the research was conducted objectively, and there were no financial, personal, or professional relationships that could have influenced the study outcomes or interpretations.

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