“Enhancing the perception of a student-friendly institution through the green environment: Insights from a Hungarian university”

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ENHANCING THE PERCEPTION OF A STUDENT-FRIENDLY INSTITUTION THROUGH THE GREEN ENVIRONMENT: INSIGHTS FROM A HUNGARIAN UNIVERSITY

Abstract

This paper explores the concept of place attachment, encompassing its meaning and representation among university students. It provides a comprehensive picture of place identity and place attachment among university students. The planned approach was to conduct a survey among students to examine their attachment to place from a green perspective. A questionnaire was used, and the data were analyzed using SPSS version 28 and Smart PLS 4. This paper summarizes the results of a survey of 245 students studying at the Budapest University of Economics and Business in 2022/23. The students were graduates in International Studies and Commerce-Marketing. The setting of the study was the university environment because it is an institution of higher education, a bastion of knowledge transfer, and the issue of attachment is very important in the relationship between educational institutions and students. The results confirmed that students perceived green energy (β: 0.283, t: 4.637 p: 0.000) and green solutions (β: 0.430, t: 9.155 p: 0.000) as having a significant effect on whether or not they perceived the institution as student-friendly. It is no coincidence, therefore, that students are satisfied with the green environment of the university (74%). They believe that the university has an adequate amount of green space (68%). However, the current situation could be improved, with a large proportion of students missing the widespread use of green (79%) and renewable energy (70%) in the institution.

Keywords place, attachment, identity, environment, education, university, atmosphere, student

JEL Classification I21, I23, I25

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INTRODUCTION

The basic principle of environmental psychology is that attachment to place develops because individuals organize their human existence around places. People develop enduring, meaningful emotional attachments to places where they have had many experiences and which have served to satisfy their needs (Hidalgo & Hernández, 2001). Attachment to place is encapsulated in place identity, a cognitive schema consisting of a set of place-related memories, feelings, values, and behavioral patterns. Strong place attachment has a number of effects on individuals' lives; for example, they are dependent on certain cities, and this has been described as a strong emotional attachment to the places they live (McAndrew, 1993). Places can include, among others, place ownership, identity, and attachment, which are general emotions (Dúll, 2009). So, investigating the role of higher education institutions in the attachment of university students to place is essential.

1. LITERATURE REVIEW AND HYPOTHESES

Place identity influences individuals' sense of belonging and attachment, contributes to social cohesion by creating a shared sense of identity and pride among residents, and contributes to individuals' psychological well-being by providing a sense of rootedness, continuity and stability. Place attachment refers to an individual's emotional attachment to a place (Hidalgo & Hernández, 2001; Zimmerbauer, 2011; Gieseking et al., 2014).

Livingston et al. (2008) classified place attachment into two types: emotional attachment and functional attachment. Emotional attachment reinforces an individual's sense of identity, where specific aspects of place contribute to a unified experience, thereby increasing self-esteem. In contrast, functional attachment arises when the place satisfies the psychological and physical needs of the individual.

Environmental and social psychologist Proshansky (1976) is credited with introducing the concept of place identity. He argued that place identity is a component of an individual's self-identity, which is formed through knowledge and emotions accumulated during everyday encounters. Place identity is shaped by the various roles that place plays in facilitating belonging, creating meaning, nurturing relationships, and helping people adapt to change.

Another prominent perspective on place identity can be found in Paasi's (2001) work. He proposes a more nuanced interpretation, distinguishing between two different aspects of place identity: place identity that is inherent in the place itself and place identity that is attributed to a place by individuals or groups.

According to Shumaker and Taylor (1983), attachment is not merely a physical or geographical bond but rather involves the emotional resonance and cognitive understanding that individuals develop towards their environment.

Place and identity are inherently intertwined. The formation of new attachments, especially when one is in a foreign country, is even more important if one plans to stay in that country for a longer period of time. If a student studies in a foreign country for several years, it is recommended that he or she develops a bond between himself or herself and the place where he or she is studying, as this will make life there easier. This effort can be seen in immigrant communities, where individuals try to create a sense of belonging to their new environment by planting specific tree species or incorporating cultural architectural elements (Mitchell, 2004).

While Paasi (2001) argues that place identity encompasses the natural, cultural, and social aspects that distinguish one region from another, Groote and Haartsen (2008) and Haartsen et al. (2000) have developed this concept further, arguing that local identity is defined as the physical and anthropogenic processes that are defined as the fusion of distinctive elements and structures within places and the meanings attributed to those places.

In their study, Garavito and Lundholm (2016) used the Person-Process-Place framework proposed by Scannell and Gifford (2010) to investigate different aspects of fishermen's attachment to place in local ecosystems. In this framework, attachment to place was conceptualized as a multidimensional construct that includes person, psychological processes, and place.

Xin Li et al. (2015) further analyzed the concept and created three subcategories of place attachment (social, economic, and physical).

It is also interesting to see how attachment to green spaces can motivate individuals to actively participate in environmental protection and adopt environmentally friendly behaviors (Vaske & Kobrin, 2001). Neighborhoods with abundant green spaces, especially neighborhoods with community green spaces, promote social cohesion among residents and improve the overall social environment (Westphal, 2003).

The study aims to identify and analyze the factors that play a role in attachment to university places.

The study analyzes the validity of the following hypotheses:

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H1: Students' perception of green environmental solutions has an impact on the student-friendly image of the institution.

H2: Students' perceptions of the transport accessibility of the university based on the survey have an impact on the student-friendly perception of the institution and thus on the attachment to the place.

H3: Students' perception of the institution's use of green energy has an impact on the student-friendly image of the institution.

In the following, the research results are presented along with the test of these hypotheses.

2. METHOD

The study was carried out in 2022/23. The modern campus of the Faculty of International Management and Business with a dormitory is in the 16th district of Budapest in a green suburban area. It is easy to access the location by suburban rail, by bus, or even by bicycle. There are several great facilities for students to relax here after work or study: they can enjoy the amenities of the sports complex nearby, such as a swimming pool, sports hall, ice rank and football pitch with club rooms. Furthermore, there is a theatre behind the university building where various Hungarian and international plays are regularly performed. Between the theater and the buildings of the university, students can enjoy strolling in the walkway of chestnut trees leading to the building of the swimming pool. The theater regularly organizes community events, concerts, and a flea market, which is also open to the public.

At the time of the survey, the Faculty of International Management and Business had nearly 4,500 students. The students participating in the research were approached through a questionnaire posted on the Internet. Completion was voluntary and anonymous, and the survey was conducted in compliance with the GDPR regulations imposed by the university. The questionnaire compilers specifically indicated that the results were for research purposes only. Since the questionnaire was posted on the social media platform, the willingness of the respondents to answer was measured. A pilot questionnaire was conducted before completion with 10 students, and as there were no problems of interpretability for the respondents, the questions were sent out unchanged.

It was not an already existing questionnaire that was used, but a set of new questions were designed and elaborated to test the university students. On the question of questionnaire reliability, a small group of students were who had previously participated in the research and obtained similar results to the original interrogation.

The questionnaire questions could be divided into three main groups. The questionnaire consists of the following groups of questions (see Table 1).

In the survey, students had to answer 46 questions, 41 of which were closed and five open questions. The closed questions were categorical and metric questions based on a Likert scale of 4. The 4-point scale was treated as an interval scale. The choice of a 4 was based on the experience of previous research. Aybek and Toraman (2022, p. 534) indicate that participants in their study preferred the 4-point response option more than the 5-point response option. "If we want to make the respondent draw the line in one direction or the other, it is recommended to give an even number of points to force the respondent to make a choice."

Chang (1994) conducted a study involving 165 participants to evaluate a 9-item Likert scale, of-

Table 1. Groups of questions in the questionnaire

Specific questions	Features of the university environment	Satisfaction with the environmental opportunities offered by the university
1. Location 2. Gender 3. Age 4. Disability 5. Number of subjects related to the environment	1. The role of the university in sustainability: green solutions, recycling 2. Conformity of the campus environment	1. Green spaces and recreational opportunities on campus 2. Sustainability solutions in the campus environment 3. What solutions can improve the environment of the campus?

Table 2. Specification of the sample (N, %)

Source: Own table (2023).

Features	N	%
Gender	Male: 85 persons	Male: 34.7%
	Female: 160 persons	Female: 65.3%
Age	Between 18-20: 58 persons	Between 18-20: 23.7%
	Between 21-25: 129 persons	Between 21-25: 52.7%
	Above 25: 58 persons	Above 25: 23.7%
How many environment-related subjects did you have during your university studies?	More than 2: 55 persons	More than 2: 22.4%
	2 subjects: 46 persons	2 subjects: 18.8%
	1 subject: 85 persons	1 subject: 34.7%
	None: 59 persons	None: 24.1%

Note: N = 245.

fering both 4-point and 6-point versions. The findings revealed that the 4-point scale exhibited greater reliability compared to the 6-point scale. The 4-point Likert scale allows researchers to provide four extreme options without a neutral choice (Fleetwood, 2022).

On a 4-point Likert scale, the respondent is forced to form an opinion. Data were analyzed using SPSS version 28 and Smart PLS 4.

The questions were answered by 245 students and all responses were evaluated. The research results start with the specification of the sample. Table 2 summarizes the data.

3. RESULTS

The survey asked students for their views on whether they thought it would be feasible to create more green spaces on campus. 84.5% of the respondents agreed with this idea, 10.6% did not believe in the possibility, while 4.9% would be in favor of such a plan.

66.2% of women believe in this project, while only a third of men agreed. There were no gender differences of opinion on this question among respondents (Chi-square:.745; df: 2 sig.: .689; $p > 0.05$).

In terms of age, more than 80% of respondents in all three age groups (18-20, 21-25 and 25+) thought they would support a green project (Chi-square: 3.807 df: 4 sig.: .433 $p > 0.05$). Respondents had similar views depending on whether they had studied a subject related to environmental issues at university. Those who had taken more than 2 such courses had 91% support for the project, compared to 84.8% of those who had taken 2 courses, 80% of those who had taken one course on an environmental issue, while 85% of those who had not had such a course would have supported increasing green space (Chi-square: 8.712 df: 6 sig.: .190 $p>0.05$).

11.4% of respondents regularly use the outdoor environment for learning and teaching. 37.6% rarely, 44.9% do not, while 6.1% could not answer the question. Only 10% of women regularly study in this environment, compared to 14.1% of men (Chi-square: 1.292 df: 3 sig.: 731 $p > 0.05$). No significant relationship was found between the two variables.

13.8% of 18-20-year-olds, 11.6% of 21-25-year-olds, and 8.6% of 25+ year olds use the green environment for studying (Chi-square: 5.046 df: 3 sig.: 538 $p > 0.05$) There was no significant relationship between the two variables. Those who study subjects related to the environment are more likely to be outside in the green for educational purposes than those who do not (23.6% of those who study more than 2 subjects, 8.5% of those who have not studied such subjects study in the green regularly). The results showed a significant difference when examining the latter question (Chi-square: 36.254 df: 9 sig.: 0.01 $p < 0.05$). There was a significant relationship between the two variables.

Then a model was constructed to examine the contribution of the university environment to the institution's student-friendly policies and practices. The model built by latent variables was based on the structural equation model (SEM), including the variance-based method (PLS over-analysis).

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Latent variables can be endogenous or exogenous, where exogenous is the independent variable and endogenous is the dependent variable.

Five latent variables, all of which became low-level constructs, were elaborated in the model. Each variable's effect can be direct or indirect. Mediator variables, which act as mediators between the two latent variables, were also incorporated. The five constructs have been named green features and facilities on campus, green energy solutions, travel facilities on campus, student-friendly policies, and other green facilities.

The created model is based on how travel, green solutions, green energy, and other opportunities affect student-friendly solutions and policies at the university. Furthermore, how green energy is affected by, for example, on-campus travel, green solutions, and other green options.

The model consists of two parts: the measurement model and the structured model.

The analysis starts with the measurement model. The measurement model shows the relationship between latent variables and items. The items were measured on a Likert scale of 4, which was analyzed as an interval scale throughout the research. In PLS SEM path analysis, it is not a prerequisite that the items are normally distributed (Hair et al., 2016). The items were not normally distributed. The normal distribution was tested by the researchers using the Kolmogorov-Smirnov and Shapiro-Wilk tests, where the p-value for all variables was less than 0.01, i.e., the items were not normally distributed. Table 3 presents the latent variables, the items, and the mean and standard deviation of the manifest variables.

On a four-point Likert scale, a one was not at all characteristic, while a four was completely characteristic. The results show that the university's location is very favorable from a transport point of view (M: 3.32, 3.11), with good cycle access and relatively easy access to the university and the city center. The green size is also relatively acceptable (M:3.04); the institute is in a large, landscaped area where students can relax and study in the green. The issue of green energy is still an open question and there is room for improvement regarding this type of solution and resources (M: 2.11, 1.89). Students feel that their environment is more student-friendly than not. There are more recreation opportunities, and the symbiosis between the environmental and the man-made environment works well on campus (M: 3.04). Most of the answers showed that respondents had similar views on the issues.

In the measurement model, standardized factor weights were above 0.5 for all variables (Hair et al., 2016). To examine the multicollinearity of the indicators, the VIF values were examined more thoroughly, and they were below the five-limit

Table 3. Constructs and items (M, SD)

Source: Own table (2023).

Constructs		Items	N		M	SD
			Valid	Missing		
G Green solution	G1	I think that the green area around the campus is enough	245	0	3.04	0.938
	G2	There are interesting plant or animal species at my campus	245	0	2.25	1.076
	G3	There are leafy big trees for the provision of shade during the hot season at my campus	245	0	2.93	1.030
	G4	There are many green places to sit and bask in the sun	245	0	3.04	0.884
E Energy	E1	Renewable energy sources are used extensively on your campus	245	0	2.11	0.795
	E2	My campus is sustainable; several facilities are operated with green power	245	0	1.89	0.815
T Transport	T1	The university is fully accessible by bike	245	0	3.11	0.838
	T2	There are many alternatives to private transport (bike, public transport, walk) come to the University	245	0	3.32	0.828
O Other	O1	There are drinking fountains available in the green areas of my campus	245	0	1.60	0.870
	O2	There are outdoor arcades to walk around the rainy days	245	0	1.69	0.851
F Student-friendly	F1	My campus is a good example of blending of natural and built, artificial environment.	245	0	2.54	0.842
	F2	We do selective waste management at the campus	245	0	2.67	0.988

Table 4. Standardized factor weights, VIF, validity and reliability results

Construction	Variable	Standardized factor weight	VIF	Cronbach's alpha	CR	AVE
G	G1	0.729	1.479	0.750	0.841	0.571
	G2	0.709	1.238			
	G3	0.770	1.505			
	G4	0.810	1.879			
E	E1	0.870	1.435	0.710	0.873	0.775
	E2	0.891	1.435			
T	T1	0.840	1.178	0.560	0.819	0.694
	T2	0.827	1.178			
O	O1	0.794	1.219	0.595	0.829	0.709
	O2	0.887	1.219			
F	F1	0.902	1.166	0.548	0.809	0.681
	F2	0.740	1.166			

value for all variables. The reliability of latent variables was first checked using Cronbach's Alpha. This was below the threshold of 0.7 for two variables. Nevertheless, the constructs were retained as the composite reliability (composite reliability, threshold 0.7) showed higher values for all latent variables. To measure convergence validity (average variance extended), AVE was used. The AVE was well above the threshold of 0.5 for all variables. The standardized factor weights, VIF, Cronbach's alpha, CR, and AVE are presented in Table 4. Latent variables and items are indicated using the letters shown in Table 4.

The test of discriminant validity was carried out, among others, according to the Fornell-Larcker (1981) test. According to the test, the square root of the mean variance extracted by a construct must be greater than the correlation between the construct and any other construct. This criterion was met for the model. The other option is the HTMT ratio (Heterotrait-Monotrait ratio), which is used to show the correlation of indicators between different constructs. This is below 0.85-0.9 (Henseler et al., 2015), values that were appropriate in the model. Discriminant power can also be tested using the cross-loading method, which also tested the model well. The discriminant results are summarized in Tables 5, 6, and 7:

The results showed that the measurement model was the most appropriate.

For the structured model, bootstrap sampling was used to test the significance of the path coefficients. The sub-sample number was set at 5,000 and the

Table 5. Fornell Larcker criterion

Source: Own table (2023).

Construction	E	G	O	F	T
E	0.880	–	–	–	–
G	0.338	0.756	–	–	–
O	0.434	0.256	0.842	–	–
F	0.447	0.538	0.268	0.825	–
T	0.064	0.094	–0.050	0.093	0.833

Note: the highlighted values are the square root of the AVE values.

Table 6. HTMT ratio

Construction	E	G	O	F	T
E	–	–	–	–	–
G	0.449	–	–	–	–
O	0.659	0.363	–	–	–
F	0.698	0.793	0.432	–	–
T	0.161	0.163	0.177	0.167	–

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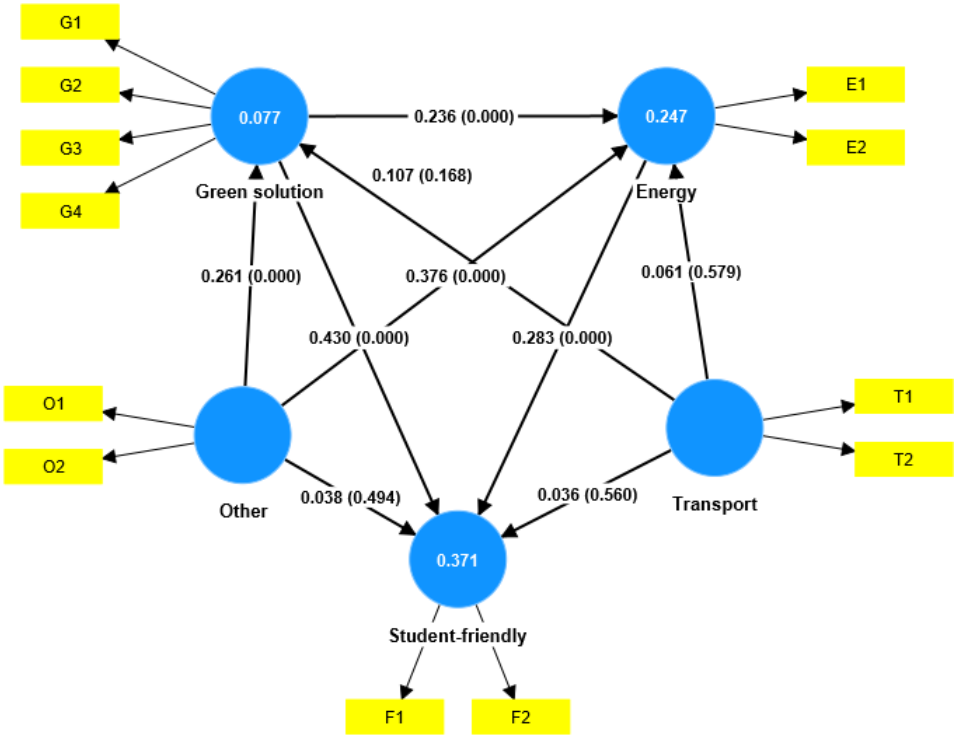

Figure 1. Model with SMART PLS4

Table 7. Cross loading

Variables/ Construction	E	F	G	O	T
E1	0.870	0.376	0.254	0.375	0.120
E2	0.891	0.409	0.337	0.388	−0.003
F1	0.420	0.902	0.535	0.269	0.081
F2	0.304	0.740	0.321	0.156	0.073
G1	0.261	0.372	0.729	0.113	0.146
G2	0.311	0.403	0.709	0.311	0.019
G3	0.248	0.467	0.770	0.183	0.025
G4	0.175	0.361	0.810	0.132	0.115
O1	0.323	0.159	0.199	0.794	−0.015
O2	0.400	0.279	0.230	0.887	−0.063
T1	0.005	0.095	0.097	0.042	0.840
T2	0.103	0.059	0.059	−0.128	0.827

Note: Items that belong to the latent variable are marked in grey.

p-value was set at a significance level of 0.05. The model analysis examined whether the independent variables have a significant effect on the dependent variables. The beta coefficient was also analyzed, which shows how much one variable affects the other. The R-square value was also analyzed. This value indicates the extent to which the magnitude of the change in the endogenous variable is explained by the exogenous variables. Figure 1 shows this model.

The R-square values were indicated in the rings. In the arrows, the significance level p (in parentheses) and β were indicated where p is less than or equal to 0.05, and the relationship between the variables is significant. Mediator variables were also included in the model.

There is an indirect effect between latent variables through the mediating variables, and if there is no mediating variable, there is a direct effect. Together, the direct and indirect effects can be considered as the total effect. The relationship between each variable is summarized in Tables 8 and 9. The tables show the beta values of the T-statistic,

Table 8. Direct connections

Constructions	β value	T statistics	P values
Energy → Student-friendly	0.283	4.637	0.000
Green solution → Energy	0.236	4.403	0.000
Green solution → Student-friendly	0.430	9.155	0.000
Other → Energy	0.376	6.268	0.000
Other → Green solution	0.261	4.498	0.000
Other → Student-friendly	0.038	0.685	0.494
Transport → Energy	0.061	0.555	0.579
Transport → Green solution	0.107	1.378	0.168
Transport → Student-friendly	0.036	0.583	0.560

which, if above 1.96, is appropriate. Alternatively, the relationship is significant if the significance level is below 0.05.

The data show that there is no relationship between university transport and accessibility and the extent to which young people perceive the university as student-friendly (β: 0.036, t: 0.583, p: 0.560). Furthermore, other environmental ideas that were asked from the students also had no effect on the extent to which students feel that their environment is student-friendly (β: 0.038, t: 0.685, p: 0.494).

Student perceptions of the school being student-friendly are influenced using green energy (β: 0.283, t: 4.637, p: 0.000), green solutions (β: 0.430, t: 9.155, p: 0.000). The implementation of green energy is influenced by the use of green solutions (β: 0.261, t: 4.498, p: 0.000), and other solutions asked about the university (β: 0.376, t: 6.268 p: 0.000) influence green energy with green solutions (β: 0.261, t: 4.498, p: 0.000).

The study also analyzed indirect links. Table 9 shows the indirect links. For example, green solutions have a direct and indirect impact on the student-friendliness of the institution through green energy. In this case, the total effect is the sum of the direct effect (β: 0.430) and the indirect effect (β: 0.236*0.283): (β: 0.497). Since the indirect relationship is positive and significant for these three variables and the total effect is also positive and significant, this is an additional partial mediation in the model. A similar mediation process can be identified between other options for green solutions and green energy. The direct relationship is significant and positive (β: 0.376) between other options and green energy, and green solutions are also a significant positive mediator between the latent variable (indirect effect: β: 0.261*0.236). In this case, it is a complementary partial mediation. The indirect relationships are presented in Table 9.

Finally, R squares values were also checked. It can be clearly seen that green solutions and other environmental options significantly explain the 24.7% change in the availability and use of green energy. In the auditory friendliness perception of the institution, 37.1% of the change is explained by green solutions and green energy opportunities. 7% of the variance in green solutions is attributed to university transport facilities and other environmental solutions. A further line of investigation could be to assess the added value of green solutions not only outside the institution but possibly also inside, to student well-being.

Table 9. Indirect connections

Constructions	β value	T statistics	P values
Other → Green solution → Student-friendly	0.112	3.967	0.000
Transport → Energy → Student-friendly	0.017	0.538	0.590
Transport → Green solution → Student-friendly	0.046	1.345	0.179
Green solution → Energy → Student-friendly	0.067	3.200	0.001
Transport → Green solution → Energy → Student-friendly	0.007	1.134	0.257
Other → Green solution → Energy → Student-friendly	0.017	2.615	0.009
Other → Green solution → Energy	0.061	3.274	0.001
Transport → Green solution → Energy	0.025	1.217	0.224
Other → Energy → Student-friendly	0.106	3.716	0.000

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Table 10. Hypothesis-thesis table

Hypothesis	Decision	Thesis
Students' perception of green environmental solutions has an impact on the student-friendly image of the institution	Accepted	Students' perception of green environmental solutions has an impact on the student-friendly image of the institution
Students' perceptions of transport accessibility of the university, based on the survey, have an impact on the student-friendly perception of the institution	Rejected	Students' perceptions of transport accessibility of the university, based on the survey, don't have an impact on the student-friendly perception of the institution
Students' perception of the institution's use of green energy has an impact on the student-friendly image of the institution	Accepted	Students' perception of the institution's use of green energy has an impact on the student-friendly image of the institution

Based on the above analyses, the following decisions were made about the hypotheses, which are summarized in Table 10.

4. DISCUSSION

Place attachment refers to the emotional connection that individuals develop with a place where they feel comfortable and safe. Place identity is described as an integral part of personal identity, shaped by relationships with different environments.

This research presented some of the results of a study conducted at one of Hungary's largest universities. The analyses show that both green solutions and the use and presentation of green energy have a positive significant impact on students' perceptions of the student-friendly characteristics of the institution. On this basis, the first and third hypotheses could be accepted. However, from the present study, it is not proven that the institution's attitude impacts the school's student-friendly policy. On this basis, the second hypothesis was rejected.

Alternatively, further research could be conducted on how green education enhances effective knowledge transfer, acquisition, and retention.

Studies indicate that individuals tend to feel more comfortable in landscapes reminiscent of their upbringing, and they often experience decreased stress levels when engaging in recreational activities in environments that evoke a sense of familiarity and belonging. (Adevi & Grahn, 2011). Place identity stands as a foundational concept in environmental psychology, suggesting that identities develop in connection with environments. Thus, the environment matters a lot, and it also matters to what extent the people are attached to it.

Anguelovski (2014) argued that shared cultural, linguistic, and geographical experiences enhance the sense of community, a concept further reinforced by empirical research. The concept of place identity provides valuable insights into individuals' subjective perceptions of geographic space, offering relevance to a range of disciplines, including geography, sociology, psychology, environmental sciences, ecology, public administration, and spatial planning (Haartsen et al., 2000, 2003).

There are many categories of identity. These include race, gender, nationality, etc., and place identity. It can be seen as a significant category of identity, containing symbols of many different social categories and personal meanings, and representing and maintaining identity at different levels and dimensions (Hauge, 2007). The result of the present study confirms this view.

The study aimed at depicting place identity by focusing on different environmental factors and how it is constructed. The students participating in the survey were – without any exceptions – living far from their families, far from their homes, and in many cases thousands of kilometers away from their home countries. In the paper, the results of Chow and Healey's (2008) study could be justified as they argued that the significance and values represented by place features or icons contribute to the development of place identity.

CONCLUSION

The research presented some of the results of a study carried out at one of the largest business universities in Hungary. The aim of the research was to assess the extent to which green environmental initiatives in the institution's internal and external environment foster emotional attachment between the institution and students and create a student-friendly atmosphere. The analyses showed that both green solutions and the use of green energy positively reinforce students' attachment to the institution.

This is evidenced by the fact that every second student makes use of the green environment during their time at university. The students surveyed expressed satisfaction with both the size and nature of the green spaces, as well as the campus's green accessibility. Among the respondents, 65% mentioned the availability of bicycle parking, and 78.4% highlighted the adequacy of car parking. However, they also recognized room for improvement in the university's use of green energy.

The present study did not show that the institution's approach had an impact on the school's student-friendly policy.

The authors' future study aims to analyze the extent to which education in a green environment, reinforced by green thinking, enhances effective knowledge transfer, acquisition, and retention.

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