

ECOTOURISM DESTINATION LOYALTY MODEL IN SELANGOR: A MEDIATING AND MODERATING MECHANISM

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Abstract: *As ecotourism gains attention, understanding the psychological and experiential factors that contribute to tourists' attachment to nature-based destinations has become increasingly important. This study investigates the role of tourism experience in influencing ecotourism destination loyalty, proposing a model that incorporates both mediating and moderating effects. Drawing on data from 251 respondents across five ecotourism sites in Selangor, Malaysia, a quantitative approach was employed using a structured questionnaire. Structural Equation Modelling (SEM) was conducted via SmartPLS 4 to test the hypothesised relationships. The results reveal that tourism experience significantly mediates the relationship between social media engagement and ecotourism destination loyalty. Furthermore, environmental beliefs were found to moderate the strength of these relationships, enhancing the impact of tourism experience on loyalty. These findings offer critical insights for ecotourism stakeholders, emphasising the importance of crafting emotionally enriching and memorable tourist experiences. Policymakers and destination managers should focus on leveraging social media and fostering strong environmental values to promote repeat visitation and support sustainable tourism development.*

Keywords: *Tourism Experience, Holistic Destination Image, Environmental Beliefs, Value Belief Norm Theory*

Introduction

Ecotourism serves as a strategy to advance Sustainable Development Goal 8, which focuses on promoting decent work and economic growth. Ecotourism in Malaysia provides tourists with an understanding of human impact on the environment and enhances appreciation for natural habitats. The motivation for tourists to explore and visit natural attractions is often linked to a desire for responsible and sustainable engagement with these environments. The Malaysia National Ecotourism Plan (2016-2025) has been affected by Covid-19, similar to other tourism products. The Selangor state government has allocated RM 114.6 million for the period from 2021 to 2025 to implement various economic stimulus programs. These initiatives encompass a range of sectors, including the Selangor Maritime Gateway, Kita Selangor, tourist grants, and the Go Selangor mobile app, aimed at enhancing the state's tourism industry. Consequently, the number of domestic visitors to Selangor rose, reaching 10.2 million by 2021, the highest figure for any state. This illustrates the considerable demand within the tourism sector for Selangor's appealing tourism offerings. Ecotourism destination loyalty represents a strategy within tourism that is believed to contribute to the advancement of Sustainable Development Goal 8. Destination marketers have acknowledged the increasing significance of ecotourism destination loyalty in enhancing destination promotion. Ecotourism destinations lacking loyalty among tourists have resulted in conflicts and inconveniences. This study seeks to examine the factors contributing to ecotourism destination loyalty in Selangor.

Literature Review

Theoretical Background

This study focuses on the tourism experience, defined as a multi-dimensional construct that includes elements such as enjoyable learning, immersion, engagement, interpersonal connections, and emotional responses. This perspective, rooted in the Expectation-Confirmation Theory (Oliver, 1980; Pan et al. (2024)), highlights the importance of memorable and engaging experiences in enhancing visitor satisfaction and loyalty. ECT posits that a consumer's inclination to repurchase or maintain loyalty to a service or product is influenced by their pre-consumption expectations, post-consumption perceptions, and the level of alignment between the two. This concept has been increasingly employed in tourism, especially in recent ecotourism studies, to analyse the factors influencing tourist satisfaction and loyalty Baptista et al. (2024).

The holistic destination image functions as a mediator in this model, connecting tourists' internalised experiences to their external behavioural outcomes, especially regarding ecotourism destination loyalty. Destination Image Theory (DIT) posits that tourists form cognitive representations of a location shaped by their perceptions, beliefs, emotions, and experiences. The images profoundly affect tourists' behavioural intentions, particularly with their satisfaction, trust, and allegiance to a destination (Sahabuddin et al., 2024). In ecotourism, the comprehensive destination image — encompassing cognitive, emotional, and unique attributes — is a vital prelude to destination loyalty.

This study is grounded in the convergence of two principal theoretical frameworks: Expectation-Confirmation Theory and Value-Belief-Norm (VBN) Theory. Yuliana et al. (2023) indicate that a positive destination image may mediate the relationship between experience and loyalty. Furthermore, tourists' environmental beliefs, as outlined in the VBN framework, are anticipated to influence this relationship by either enhancing or reducing the effect of destination image on loyalty. The mediating and moderating mechanisms offer a detailed

understanding of the relationship between tourism experience and destination loyalty in the realm of sustainable ecotourism.

Tourism Experience and Ecotourism Destination Loyalty

Tourism experience has a significant impact on tourists' impressions and loyalty intentions. In the context of ecotourism, these experiences are generally enhanced by interactive, immersive, and emotionally engaging interactions with nature and local culture. Dimensions such as fun learning, immersion, acting, relating, and emotional experiences serve as the foundation for an expanded tourism experience that can improve tourists' perceptions of the place.

Expectation-Confirmation Theory (Oliver, 1980) is often employed to clarify the relationship between experience and loyalty. Tourists generate expectations prior to their visit; if the actual ecotourism experience aligns with or exceeds these expectations, it leads to satisfaction, hence fostering destination loyalty (Basendwah et al., 2024). This ecotourism paradigm has expanded to include not only service-related enjoyment but also emotional and environmental aspects (Sridhar & Sivaperumal, 2025). Therefore, the following hypotheses are developed:

H1a: Fun learning experience has a significant influence on holistic destination image.

H1b: Immersion experience has a significant influence on holistic destination image.

H1c: Acting experience has a significant influence on holistic destination image.

H1d: Relating experience has a significant influence on holistic destination image.

H1e: Emotional experience has a significant influence on holistic destination image.

Holistic Destination Image and Ecotourism Destination Loyalty

Holistic destination image refers to the overall perception of a place formed through both cognitive and affective evaluations. Previous studies have shown that a positive holistic image increases tourists' likelihood of revisiting and recommending a destination. In ecotourism, where authenticity and meaningful experiences are valued, the image of the destination significantly shapes loyalty outcomes.

Destination Image Theory (DIT) asserts that the perceived image of a location, moulded by marketing, personal experiences, and word-of-mouth, affects tourists' decision-making, satisfaction, and subsequent behaviour after their visit. A favourable perception increases the likelihood of revisit intention and loyalty (Gartner, 1993; Karri and Dogra (2022) Ecotourism generally conjures notions of ecological responsibility, cultural authenticity, environmental purity, and emotional engagement. Lai and Hitchcock (2021) assert that emotional fulfilment and personal progress cultivate a favourable holistic perception of ecotourism sites. Tourists with a positive view of an ecotourism destination are more likely to return. The research conducted by Luekveerawattana (2025) presents a comprehensive portrayal of national parks that enhances the desire for return visits. Baptista et al. (2024) showed that both cognitive and emotive image elements predict loyalty in island eco-destinations. Consequently, the subsequent hypothesis is posited:

H2: Holistic destination image has a significant influence on ecotourism destination loyalty

The Mediation Role of Holistic Destination Image

Holistic destination image not only influences loyalty directly but may also serve as a bridge between tourism experience and loyalty. This mediating role suggests that how tourists internalise and perceive their overall experience (through the image of the destination)

ultimately determines their loyalty. Thus, it is important to understand whether each experiential dimension contributes to loyalty through the lens of destination image.

H3: Holistic destination image mediates the relationship between tourism experience and ecotourism destination loyalty

H3a: Holistic destination image mediates the relationship between fun learning experience and ecotourism destination loyalty.

H3b: Holistic destination image mediates the relationship between immersion experience and ecotourism destination loyalty.

H3c: Holistic destination image mediates the relationship between acting experience and ecotourism destination loyalty.

H3d: Holistic destination image mediates the relationship between relating experience and ecotourism destination loyalty.

H3e: Holistic destination image mediates the relationship between emotional experience and ecotourism destination loyalty.

The Moderation Role of Environmental Beliefs

Environmental beliefs, rooted in one's value system and awareness of ecological issues, can influence how tourists interpret their experiences and form loyalty. Tourists with strong environmental beliefs may be more responsive to ecotourism offerings and more likely to return or recommend destinations that align with their values. Therefore, environmental beliefs may moderate the strength of the relationship between destination image and loyalty.

H4: Environmental beliefs moderate the relationship between holistic destination image and ecotourism destination loyalty

Research Methodology

A quantitative approach to data collecting was used in this research. The quantitative approach proves to be effective in recognising patterns and generalising findings from a sample to a wider population (Davidsson & Patel, 2003). Figure 1 illustrates the conceptual framework that examines how multi-dimensional tourism experiences impact loyalty to ecotourism destinations, incorporating holistic destination image as a mediating variable and environmental beliefs as a moderating factor.

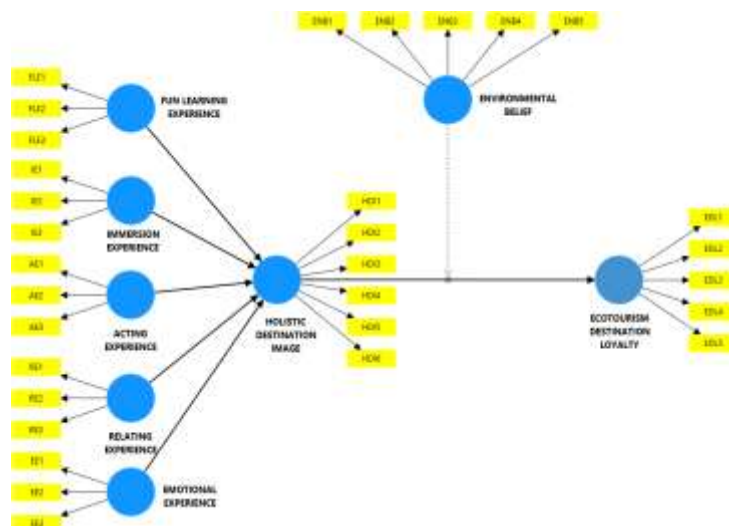


Figure 1: Conceptual framework

After the conceptual model was developed, a structured questionnaire was created to serve as the main research tool. The items and dimensions were modified based on earlier empirical research and corresponded with the theoretical constructs presented in the framework. The questionnaire consisted of five primary sections: (1) respondent profile, (2) assessment of tourism experience, including fun learning, immersion, acting, relating, and emotional experience, (3) holistic destination image (HDI), (4) environmental beliefs (EB), and (5) ecotourism destination loyalty (EDL).

All measurement items were developed and improved based on validated tools utilised in previous studies, particularly those by Mengkebayaer et al. (2022), and Zhou and Wang (2024). The items underwent assessment utilising a seven-point Likert scale, spanning from 1 (strongly disagree) to 7 (strongly agree). The intentional use of multi-item constructs aimed to encapsulate the complexity of each variable while addressing the limitations inherent in single-item measures (Nunnally, 1978; Vanhengel et al. (2025).

The questionnaire underwent pre-testing to confirm its face and content validity, followed by data collection at five chosen ecotourism sites in Selangor, Malaysia. The focus group included both local and foreign visitors who have firsthand experience at these locations. A non-probability purposive sampling technique was utilised, concentrating on participants who had engaged in at least 70% of their visit activities, thereby ensuring that the responses were informed and grounded in actual experiences.

The analysis of data was conducted with SmartPLS 4, which facilitated a structural equation modeling (SEM) approach appropriate for assessing intricate mediation and moderation models that include latent constructs. This approach facilitated a thorough evaluation of both direct and indirect connections in accordance with the suggested hypotheses.

Data collection

A convenience sampling method was utilised to gather primary data via self-administered structured questionnaires. This method was selected for its effectiveness and appropriateness in gathering data in outdoor ecotourism settings. A total of 251 valid respondents were surveyed across five ecotourism sites in Selangor, Malaysia, specifically:

1. 4x4 Adventure Teratak Riverview, Hulu Selangor
2. Skytrex at Sungai Chongkak, Hulu Langat
3. Broga Hill Hiking Trail, Hulu Langat
4. Paragliding Location, Batu Pahat Hill
5. Kanching Eco Forest Park, Rawang

The sample size aligns with the guidance provided by Memon et al. (2020), which suggests that the minimum sample should be at least ten times the number of variables in the model, thus meeting the essential statistical criteria for multivariate analysis.

The questionnaire comprised items designed to assess five essential constructs: (1) tourism experience, which encompassed five dimensions—fun learning, immersion, acting, relating, and emotional experience; (2) holistic destination image (HDI); (3) environmental beliefs; (4) ecotourism destination loyalty (EDL); and (5) the basic demographic profile of respondents.

All variables were defined using validated items adapted from previous research, specifically Mengkebayaer et al. (2022), Zhou and Wang (2024). Responses were assessed using a seven-

point Likert scale, where 1 indicated strong disagreement and 7 indicated strong agreement, allowing for a detailed understanding of perceptions and attitudes. The use of multi-item scales was implemented to improve measurement reliability and to overcome the constraints associated with single-item constructs (Nunnally, 1978; Vanhengel et al. (2025).

The analysis of data was performed utilising SmartPLS 4, a tool that facilitates Partial Least Squares Structural Equation Modelling (PLS-SEM). This approach was chosen for its efficacy in examining intricate models that incorporate mediation and moderation effects, as outlined in the conceptual framework.

Data Analysis

This study utilised SmartPLS 4 to analyse data gathered from five ecotourism sites in Selangor, Malaysia, aligning with the conceptual framework of the research, which includes tourism experience, holistic destination image, environmental beliefs, and loyalty to ecotourism destinations. The data analysis utilised Partial Least Squares–Structural Equation Modeling (PLS-SEM), a method particularly effective for predictive modeling and evaluating intricate relationships that include both mediating and moderating effects. The analytical procedure adhered to the established guidelines and protocols set forth by Hair et al. (2017) and Ramayah et al. (2016), which included an assessment of both the measurement model (covering reliability, validity, and factor loadings) and the structural model (path coefficients, R^2 values, effect sizes, and predictive relevance). This method was chosen for its adaptability in managing hidden variables and its strength with smaller to medium-sized samples in the field of social science studies.

Assessment of Goodness of Measure

A seven-point Likert scale was utilised to assess all latent variables in the model. This scale provides respondents with a broader array of choices, facilitating more nuanced responses and improving the dependability and interpretability of the data. The rating varied from 1 (strongly disagree) to 7 (strongly agree). The employment of a seven-point scale is endorsed in psychometric literature for its capacity to enhance distinction, resulting in increased measurement sensitivity and more informed decision-making (Petrova et al., 2022).

Measurement instruments were created to evaluate the constructs fundamental to this study: tourism experience (TE)—comprising five sub-dimensions (enjoyable learning, immersion, engagement, connection, and emotional experience), holistic destination image (HDI), environmental beliefs (EB), and ecotourism destination loyalty (EDL). Each concept was operationalised through many questions derived from established scales in prior studies, assuring content validity and compatibility with the research aims.

Table 1 provides an overview of the constructs utilised in this study, encompassing their definitions, source references, and total item count per construct. Before comprehensive data collection, the items underwent expert evaluation and pilot testing to ensure clarity, relevance, and face validity. This procedure guaranteed the robustness of the measurement model and reduced potential ambiguity in item interpretation.

Table 1: Properties of the Measurement Items

Construct	Definition	Source	No. of Items
Ecotourism Destination Loyalty (EDL)	Destination loyalty is a multifaceted concept that includes both behavioural and attitudinal dimensions. The interplay between behavioural and attitudinal loyalty suggests that pleasurable experiences might enhance both the intention to revisit and the inclination to recommend, so increasing overall destination loyalty.	Mengkebayaer et al. (2022)	5
Tourism Experience (TE)	The tourism experience can be examined through four fundamental dimensions: emotional, cognitive, behavioural, and sensory. These elements collectively influence tourists' perceptions and interactions with destinations, significantly impacting their satisfaction and likelihood of revisiting.	Zhou & Wang (2024)	26
Holistic Destination Image (HDI)	The overall perception and image of a tourism destination as shaped by experiences and emotions.	Țuclea, Vrânceanu, & Năstase (2020)	6
Environmental Beliefs (EB)	Tourists' ecological values and attitudes that influence pro-environmental behaviour.	Firman et al., (2022)	5

Reliability and Validity Analysis

The developed measurement model was subjected to thorough evaluations for validity and reliability. Hair et al. (2017) define reliability as the extent to which an instrument consistently measures a construct, whereas validity pertains to the instrument's capacity to accurately measure its intended target. Convergent validity was assessed using factor loadings, composite reliability (CR), and average variance extracted (AVE). Hair et al. (2017) suggest that standardised factor loadings should be greater than 0.5, and that CR values should exceed 0.7 to establish sufficient internal consistency and convergent validity.

Internal consistency reliability was assessed through Cronbach's Alpha (CA), which evaluates the correlation between items that measure the same construct. A Cronbach's alpha threshold of 0.70 is regarded as the minimum standard for acceptable reliability (Hair et al., 2010). CA denotes the lower limit of internal consistency, whereas Composite Reliability (CR) indicates the upper limit, providing a more precise assessment of scale reliability (Hair, Ringle, & Sarstedt, 2013).

Table 2 presents the CA and CR values for all key constructs, which encompass tourism experience (TE) and its sub-dimensions (fun learning, immersion, acting, relating, emotional experience), holistic destination image (HDI), environmental beliefs (EB), and ecotourism

destination loyalty (EDL). All CA values range from 0.872 to 0.917, surpassing the threshold suggested by Hair et al. (2017), which indicates robust internal consistency. The results indicate that the scales employed to assess each construct demonstrate reliability and validity in the context of this research.

Table 2: Result of the Measurement Models

Latent Variable	Indicators	Loadings	CA	AVE	CR
Ecotourism Destination Loyalty (EDL)	EDL1	0.930	0.958	0.856	0.967
	EDL2	0.954			
	EDL3	0.930			
	EDL4	0.892			
	EDL5	0.919			
Holistic Destination Image (HDI)	HDI1	0.930	0.961	0.838	0.969
	HDI2	0.914			
	HDI3	0.899			
	HDI4	0.927			
	HDI5	0.890			
	HDI6	0.932			
Fun Learning Experience	FLE1	0.925	0.921	0.864	0.95
	FLE2	0.933			
	FLE3	0.931			
Immersion Experience	IE1	0.932	0.876	0.804	0.925
	IE2	0.935			
	IE3	0.819			
Acting Experience	AE1	0.943	0.935	0.885	0.958
	AE2	0.941			
	AE3	0.938			
Relating Experience	RE1	0.916	0.903	0.838	0.940
	RE2	0.896			
	RE3	0.934			
Emotional Experience	EE1	0.925	0.929	0.877	0.955
	EE2	0.916			
	EE3	0.967			
Environmental Belief	ENB1	0.909	0.904	0.726	0.929
	ENB2	0.917			
	ENB3	0.734			
	ENB4	0.771			
	ENB5	0.910			

Notes: CA = Cronbach's Alpha; CR = Composite Reliability;
AVE = Average Variance Extracted

Source: Survey data

Hair et al. (2017) highlighted that Confirmatory Analysis (CA) presumes equal loading weights among indicators across the population, which may result in an overestimation of internal consistency. The combination of CA, CR, and AVE values indicates that the measurement properties of this model are precise and reliable, thereby reinforcing the robustness of the structural model employed in this study.

Convergent validity refers to the extent to which many items exhibit a positive correlation with different measures of the same construct. Fornell and Larcker (1981) introduced the average variance extracted (AVE) as a standard criterion. Hair et al. (2017) define the Average Variance Extracted (AVE) as the overall mean of the squared loadings of the indicators, which corresponds to a construct's communality. An AVE of 0.50, for instance, accounts for about fifty per cent of the variance in its indicators (Hair et al., 2017). An AVE below 0.5 indicates that the inaccuracy in the items exceeds the variance accounted for by the constructs. Table 2 elucidates the outcomes of the measurement models. The results indicate that all employed structures are valid measures of their respective constructs based on parameter estimates and statistical significance.

Fornell-Larcker Criterion

Discriminant validity refers to the extent to which a construct accurately measures its intended variable. Hair et al. (2017) characterise discriminant validity as the extent to which a concept is empirically differentiated from other constructs. Discriminating validity is determined using Fornell and Larcker's (1981) criterion. Fornell and Larcker's (1981) criterion indicates that the concept exhibits greater variation with its indicators than with any other construct. The outer loading on the assigned latent variable must exceed the loadings on all other latent variables. Table 3 indicates that the estimated square root of the AVE surpassed the inter-correlations of the construct with other constructs in the model, thereby suggesting adequate discriminant validity.

Table 3: Fornell-Larcker Criterion

Model Constructs	AE	EDL	EE	EB	FE	HDI	IE	RE
AE	0.941							
EDL	0.319	0.925						
EE	0.333	0.562	0.936					
EB	0.225	0.595	0.455	0.852				
FE	0.577	0.398	0.486	0.375	0.93			
HDI	0.324	0.595	0.511	0.553	0.564	0.915		
IE	0.457	0.57	0.579	0.568	0.659	0.563	0.897	
RE	0.473	0.522	0.659	0.338	0.533	0.481	0.57	0.916

Source: Survey data

Heterotrait-Monotraits Ratio (HTMT)

Henseler et al. (2015) proposed the heterotrait-monotrait (HTMT) correlation ratio to assess discriminant validity. An HTMT score significantly lower than one, or definitively below 0.85, indicates the discriminant validity of a pair of constructs (Henseler, 2017). Henseler et al.

(2015) suggest HTMT cut-off values of 0.90 or 0.85; however, Voorhees et al. (2016) identified an HTMT cut-off value of 0.75 as more effective.

Consequently, neither technique accurately identifies issues related to discriminant validity concerning inter-construct correlations, which most experts consider indicative of discriminant validity. Table 4 indicates that the assessment of discriminant validity using HTMT showed all HTMT values were significantly below 0.85 (Henseler et al., 2015). Consequently, a conservative cut-off point was employed to assess discriminant validity for all constructs.

Table 4: Heterotrait-Monotrait Ratio (HTMT)

	AE	EDL	EE	EB	FE	HDI	IE	RE	EB x HDI
AE									
EDL	0.328								
EE	0.353	0.593							
EB	0.235	0.628	0.495						
FE	0.622	0.421	0.524	0.405					
HDI	0.338	0.617	0.54	0.593	0.598				
IE	0.502	0.616	0.641	0.621	0.734	0.613			
RE	0.511	0.557	0.716	0.366	0.584	0.514	0.64		
EB x HDI	0.283	0.584	0.394	0.501	0.365	0.48	0.505	0.333	

Note: HTMT < 0.85

Source: Survey data

Findings and Discussion

Following the successful validation of the measurement model, the structural model was assessed to evaluate the proposed relationships. The assessment of the structural model included an evaluation of the coefficient of determination (R^2) and the discriminant validity via Heterotrait-Monotrait Ratio (HTMT) values.

The HTMT criterion, introduced by Henseler et al. (2015), was utilised to establish discriminant validity. All HTMT values in this study fell below the conservative threshold of 0.85, as recommended by Hair et al. (2017), demonstrating that the latent constructs are empirically distinct. This indicates that each aspect of the tourism experience—fun learning, immersion, acting, relating, and emotional experiences—was distinctly recognised by respondents, thereby reinforcing the validity of the measurement model.

The coefficient of determination (R^2) evaluates the explanatory power of the structural model. According to Hair et al. (2014), R^2 values of 0.75, 0.50, and 0.25 indicate substantial, moderate, and weak levels of predictive accuracy, respectively. Chin (2010) indicated that values approximately 0.35 are deemed significant.

This study found that the R^2 value for Holistic Destination Image (HDI) was 0.423, suggesting

a moderate level of predictive power from the dimensions of tourism experience. The R^2 value for Ecotourism Destination Loyalty (EDL) was 0.518, indicating a moderately strong relationship between loyalty and the variables of Human Development Index (HDI) and environmental beliefs. The findings support the theoretical propositions that substantial and meaningful tourism experiences contribute to a positive overall destination image, subsequently enhancing loyalty to ecotourism destinations.

The structural model results largely support the hypothesised relationships, confirming the mediating role of holistic destination image and the moderating influence of environmental belief, thereby validating the proposed integrative framework.

Table 5: Coefficient of Determination (R^2)

	R-square	R-square adjusted
Ecotourism Destination Loyalty (EDL)	0.518	0.512
Holistic Destination Image (HDI)	0.423	0.411

The path coefficient indicates the hypothesised relationships among the constructs. The value range is standardised to -1 to +1. A path coefficient close to +1 indicates a strong positive relationship, while a coefficient near -1 denotes a negative relationship. The path coefficient value is statistically significant, approaching -1 or +1, contingent upon the standard error. Bootstrapping is a non-parametric method utilised for estimating the standard errors of model parameters (Mooney & Duval, 1993). PLS route modelling, lacking distributional assumptions, precludes the application of direct inference statistical tests for model fit and evaluation. Chin (2010) proposes the application of bootstrapping to address the issue. Figure 2 illustrates the route coefficient of the structural model. The results indicate that all pathways were statistically significant, as evidenced by a T Statistic greater than 1.96 in a two-tailed test.

Table 6 presents the analysis of the structural model. The findings indicated that hypotheses H1a, H1b, H1e, H2, H3, and H4 were all supported and statistically significant at $p < 0.05$, while H1c and H1d were not supported.

H1a: The Fun Learning Experience (FLE) significantly influences the Holistic Destination Image (HDI) ($\beta = 0.312$, $p = 0.002$). This finding establishes a significant positive correlation between enjoyable learning experiences and a comprehensive destination image. The findings indicate that engaging, enjoyable, and educational activities improve tourists' cognitive and affective perceptions of ecotourism destinations. Engagement in informative and playful learning activities significantly enhances tourists' overall perception of a destination (Pine & Gilmore, 1999; Mehmetoglu & Engen, 2011). Therefore, H1a is supported.

H2b: The Immersion Experience (IE) significantly influences the Holistic Destination Image (HDI) ($\beta = 0.225$, $p = 0.010$). This hypothesis is substantiated, suggesting that tourists engaged in nature-based or culturally rich ecotourism activities develop more significant impressions of the destination. The significant sensory and emotional engagement enables tourists to establish a personal connection with the location, thereby reinforcing the Human Development Index (HDI). This supports the Experience Economy theory, emphasising immersion as a fundamental aspect of experience.

H1c: Acting Experience (AE) does not significantly influence Holistic Destination Image (HDI) ($\beta = -0.065$, $p = 0.299$). This hypothesis lacks support. Despite the active participation inherent in acting experiences, such as role-playing or hands-on tasks, the minimal effect suggests that these experiences may not significantly impact the overall destination image. This may result from insufficient contextual depth or personalization in the acting activities at the assessed ecotourism sites.

Table 6: Hypothesis Testing

Hypothesis	Relationship	Beta	Standard Error	*T-Value	**P-Value	Decision
H1a	FE \rightarrow HDI	0.312	0.1	3.125	0.002	Supported
H1b	IE \rightarrow HDI	0.225	0.087	2.575	0.01	Supported
H1c	AE \rightarrow HDI	0.065	0.063	1.039	0.299	Not Supported
H1d	RE \rightarrow HDI	0.092	0.09	1.023	0.307	Not Supported
H1e	EE \rightarrow HDI	0.19	0.073	2.62	0.009	Supported
H2	HDI \rightarrow EDL	0.296	0.077	3.858	0	Supported
H3	EB x HDI \rightarrow EDL	0.197	0.054	3.644	0	Supported
H4	EB \rightarrow EDL	0.287	0.063	4.586	0	Supported

H1d: The relationship between Relating Experience (RE) and Holistic Destination Image (HDI) is not statistically significant ($\beta = 0.092$, $p = 0.307$). H1d is unsupported. The findings indicate that, contrary to theoretical assumptions, social bonding may not significantly impact the overall perception of an ecotourism destination, despite the potential benefits of shared values and interpersonal connections. Alternative dimensions of the tourism experience may assume a more pivotal role.

H1e: Emotional Experience (EE) significantly influence Holistic Destination Image (HDI) ($\beta = 0.190$, $p = 0.009$). This result corroborates the hypothesis. Emotionally significant experiences, including awe, excitement, and personal transformation, play a crucial role in influencing tourists' evaluations of a destination. This aligns with the Cognitive-Affective-Conative (CAC) model (Debbagh & Azouaoui, 2021), which asserts that affect serves as a precursor to cognitive evaluation. Therefore, H1f is supported.

H2: The Holistic Destination Image (HDI) significantly affects Ecotourism Destination Loyalty (EDL) with a coefficient of $\beta = 0.296$ and a p-value of 0.000. The findings indicate a significant positive correlation, suggesting that tourists who develop strong holistic images of a destination are more inclined to revisit and recommend it. This finding aligns with previous research emphasizing the influence of positive destination images on loyalty behaviors. Consequently, H2 is validated.

H3: The Environmental Belief (EB) construct notably influences the relationship between Holistic Destination Image (HDI) and Ecotourism Destination Loyalty (EDL), with a coefficient of $\beta = -0.197$ and a significance level of $p = 0.000$. This hypothesis indicates that tourists' environmental beliefs influence the strength or direction of the relationship between destination image and loyalty. The influence of Human Development Index (HDI) on loyalty may be enhanced or diminished by a heightened belief in environmental responsibility, contingent upon the perceived congruence with sustainable practices at the destination.

H4: The influence of Environmental Beliefs (EB) on Ecotourism Destination Loyalty (EDL) is significant, with a coefficient of $\beta = 0.287$ and a p -value of 0.000 . This hypothesis is substantiated, indicating that tourists with robust pro-environmental beliefs exhibit greater loyalty to ecotourism destinations. This is consistent with the Value-Belief-Norm (VBN) theory, which posits that environmental concern leads to support for sustainability-oriented travel behavior.

Conclusion and Future Research

The study utilised a quantitative data collection methodology, which is effective for generalising sample data to the entire population to identify patterns and trends (Davidsson & Patel, 2003). A structured, self-administered questionnaire was disseminated to 251 ecotourists at five ecotourism destinations in Selangor, Malaysia. It includes latent variables such as Tourism Experience, Holistic Destination Image (HDI), and Environmental Beliefs (EB) to evaluate their influence on Ecotourism Destination Loyalty (EDL).

The findings indicate that enjoyable learning, immersion, and emotional experiences have a significant impact on tourists' overall perception of a destination. Conversely, acting and relating experiences demonstrated no significant effect. The Holistic Destination Image significantly influences Ecotourism Destination Loyalty, while Environmental Beliefs directly affects loyalty and moderates the relationship between image and loyalty. The findings highlight the importance of experiential richness and environmental values in promoting repeat visitation and advocacy within ecotourism contexts.

This study enhances the theoretical framework of sustainable ecotourism loyalty by empirically validating a model that incorporates cognitive, affective, and normative elements. The R^2 values demonstrated moderate explanatory power, and discriminant validity was established via HTMT criteria. The implementation of a seven-point Likert scale, along with constructs derived from established literature, improves the reliability and validity of the findings.

Future research should expand the geographical scope beyond Selangor to encompass various ecotourism regions throughout Malaysia or Southeast Asia. Furthermore, the inclusion of qualitative insights or longitudinal data may reveal underlying motivations and behavioral changes over time. Investigating additional psychological constructs, including place attachment, perceived authenticity, and cultural sensitivity, may enhance the model's precision. With the increasing awareness of environmental issues, tourism professionals ought to develop immersive experiences that resonate emotionally and align with the environmental values of visitors, thereby enhancing destination loyalty within the ecotourism sector.

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