

# Revisit Intention Model of Indonesian Consumers to Malaysia for Medical Tourism: An Extension of Theory of Planned Behavior

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## Abstract

*This study analyzes the factors influencing Indonesian consumers' revisit intention to Malaysia for medical tourism, using an extension of the Theory of Planned Behavior (TPB) integrated with additional variables such as perceived value, destination image, and customer satisfaction. Using a quantitative approach, data was collected through questionnaires distributed to 385 North Sumatra and Riau respondents who have done medical tourism to Malaysia. Data analysis was conducted using the Structural Equation Modeling (SEM) method using Partial Least Squares (PLS). The results showed that behavioral, normative, and control beliefs significantly affect attitude, subjective norms, and perceived behavioral control. Perceived value and destination image significantly affect customer satisfaction, while subjective norm, perceived behavioral control, and customer satisfaction significantly affect revisit intention. Attitude does not show a significant effect on revisit intention. Customer satisfaction effectively mediates perceived value/destination image and revisits intention. The findings provide insights for medical tourism service providers in Malaysia and policymakers in developing strategies to attract and retain medical tourists from Indonesia.*

**Keywords:** *Medical Tourism, Planned Behavior, Value, Destination Image, Customer Satisfaction, Revisit Intention, Malaysia, Indonesia.*

## Introduction

The tourism industry has become one of the most dynamic sectors and contributes significantly to the global economy. Prior to the COVID-19 pandemic, the industry accounted for approximately 10% of global Gross Domestic Product (GDP) and provided one in ten jobs worldwide (UNWTO, 2020). According to a UNWTO report, the number of international tourists reached 1.5 billion in 2019 with projected growth to 1.8 billion by 2030. The tourism sector not only contributes significantly to global economic development, but also has an important role in GDP growth and job creation (Khan et al., 2020). This makes tourism able to alleviate poverty in developing countries. Tourism is proven to have a positive impact on economic growth and increased employment in various developing countries (Manzoor et al., 2019).

Medical tourism has emerged as a rapidly growing sector in the global tourism industry, combining healthcare with travel experiences (Zhong et al., 2021). Medical tourism is a multidisciplinary phenomenon that combines healthcare and tourism, with patients traveling abroad for medical treatment (McCartney & Wang, 2024). Medical tourism offers patients access to healthcare services abroad at lower costs and shorter waiting times (Foley et al., 2019). Medical tourism business has become an economic development strategy for developing countries, especially in non-OECD countries (Beladi et al., 2019). The phenomenon of medical tourism has grown rapidly in recent decades, fueled by disparities in the cost of medical care between countries, varying quality of services, as well as access to more advanced medical technologies abroad (Liverani et al., 2020; Foley et al., 2019).

Countries in Southeast Asia, such as Malaysia, Thailand, India, and Singapore, have promoted themselves as prime destinations for global medical tourists. These countries offer competitive advantages such as affordability, reputation, and advanced medical facilities (Zain et al., 2023). This success is supported by

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factors such as international hospital accreditation, globally qualified doctors, and modern and integrated medical infrastructure. Malaysia is one of the favorite countries of choice for Indonesian patients, it is shown that Indonesia contributes significantly to medical tourism in Malaysia by 70% (Gunawan et al., 2023). In addition to more affordable prices, the similarity of language with the country is also a major factor driving this high number. Malaysia offers modern medical technology and holistic services at competitive prices (Ratnasari et al., 2021).

Medical tourism contributes positively to the economies of several developing countries (Dang et al., 2020). Malaysia is actively promoting medical tourism as an economic driver (Gopalan et al., 2021). However, it is a challenge for the patient's home country where local hospital revenues decline. Indonesia itself faces the challenge of limited access in the development of medical tourism. In addition, bad past experiences, complicated administrative procedures, one-way communication from medical personnel, and long waiting times often discourage people from using medical services (Widiyanti et al., 2020). In fact, perceived service quality affects patient satisfaction and repurchase intentions in hospitals (Mahmoud et al., 2019). Brand image also plays an important role in hospital competitiveness, with social media, word of mouth, advertising, and price perception contributing to brand formation (Cham et al., 2020). In addition, factors such as trust, communication, modern technology, and holistic services are also important in the perception of medical tourism (Ratnasari et al., 2021).

Medical tourism decision-making is a complex process that is influenced by various factors. Psychological aspects such as attitudes, social norms, and perceived behavioral control play an important role (Joo et al., 2020). Travelers' choices are influenced by push, pull, and anchor factors, with pull factors having the strongest direct effect on choosing a medical destination (Gajić et al., 2023). Research predicting the factors that influence medical tourists' revisit intentions is scarce (Soliman, 2021). This is the main focus of this study. This study proposes a research model by adopting the theory of planning behavior (TPB) (Ajzen, 1991) which is expanded by adding destination image and customer satisfaction variables. This development can provide a more comprehensive understanding of the theoretical mechanisms of the framework and increase the predictive power for human intention/behavior in specific fields (Ajzen, 1991) such as medical tourism.

## Literature Review

Medical tourism is a booming industry, combining aspects of healthcare with tourism (McCartney & Wang, 2024). The industry has become significant in several Asian countries, with Thailand, Malaysia, India, and Singapore emerging as major destinations for medical tourism (Dang et al., 2020). As competition intensifies, especially in Southeast Asia, effective promotional strategies, adequate infrastructure, and hospital accreditation become increasingly important in attracting medical tourists (Fauzi et al., 2024; Guru et al., 2022). Patients are often motivated by various benefits, such as lower costs, short waiting times, and complete treatment packages (Foley et al., 2019). Key factors that influence medical traveler satisfaction include hospital accessibility, interpersonal behavior of healthcare professionals, medical costs, and technical aspects of healthcare (Rahman, 2019). In addition, the main criteria often considered by patients are physician expertise, quality of healthcare, and orientation of services provided (Wang et al., 2020). Global trends in medical tourism include investments in advanced medical technologies to attract international patients (Mutlubaş, 2020). The COVID-19 pandemic has accelerated the adoption of telemedicine and remote consultations, thus expanding opportunities for hospitals and practitioners in the medical tourism sector (Chhabra et al., 2021).

Medical tourism can have a positive impact on the destination country, such as increasing health sector revenues and the local economy (Beladi et al., 2019). However, medical tourism also poses challenges, potentially reducing hospital revenue in the patient's home country due to the flow of patients choosing treatment abroad (Medical Tourism Magazine, 2021). Indonesia faces a number of challenges in developing its medical tourism industry, mainly related to limited medical infrastructure (Supriadi et al., 2024). This has led many Indonesians to seek medical treatment abroad, particularly in Malaysia, which is known to offer quality services and more affordable costs (Saragih & Jonathan, 2019). Factors that encourage Indonesians

to undertake medical tourism include the availability of specialized services, patient-centered care approaches, as well as distrust of local doctors (Asa et al., 2024). Hospital branding plays a crucial role in attracting medical tourists, with advertising and social media communications influencing brand image and building patient trust before they use the service (Cham et al., 2021). Southeast Asia has emerged as a growth center for medical tourism, with a focus on service quality, economic growth, and accredited destinations (Fauzi et al., 2024). Moreover, factors influencing the development of medical tourism destinations include economic development, healthcare systems, and supportive institutional features (Vovk et al., 2021).

## Methods

This study uses a positivist paradigm with a quantitative approach to analyze the revisit intention of Indonesian consumers who travel to Malaysia for medical tourism. The locations in this study are Riau Province and North Sumatra due to geographical proximity and cultural similarities with Malaysia. The method used in data collection is through questionnaires distributed online (through social media platforms) and offline in strategic locations such as airports and ports, using convenience sampling techniques for access efficiency even though this method has limitations in representative reliability (Indriantoro & Supomo, 2018). The sample size used, calculated using the Cochran formula, consisted of 385 respondents. Primary data were collected directly from respondents to answer research questions, while secondary data were obtained from published sources, such as books, scientific articles, previous research, and other relevant documents, to enrich the context of the analysis. Data processing was carried out by statistical analysis using SEM-PLS to evaluate the validity and reliability of the instrument and test the relationship between variables in the research model. The results of the study are expected to contribute significantly to the understanding of factors that influence medical tourism behavior and can support evidence-based policy making in the health and tourism sectors.

### *Research Variables and Definition of Operational Variables*

This study examined various variables to understand their relationship and influence in the context of medical tourism. Variables are measurable characteristics or attributes that can vary between individuals or organizations (Creswell, 2017). Variables can produce categorical data (nominal) or continuum data (ordinal, interval, ratio) (Sugiyono, 2018). This study includes independent variables (exogenous), dependent variables (endogenous), and mediating variables (intervening).

### *Exogenous Variables*

Exogenous (independent) variables are variables that affect other variables without being influenced by the variable itself (Santosa, 2018). This study has five exogenous variables:

- Behavioral beliefs: An individual's subjective probability of a particular outcome resulting from a behavior (Lee et al., 2012).
- Normative beliefs: Perceived social pressure from significant others to engage in a behavior (Ajzen, 1991).
- Control beliefs: Perception of available resources or opportunities needed to perform a behavior (Lee et al., 2012).
- Perceived value: An assessment that compares the customer's receipt and payment (Fard et al., 2021).
- Destination image: The mental perceptions that travelers have of a destination, including feelings and belief representations (Farrukh et al., 2022).

### *Endogenous Variable*

Endogenous (dependent) variables are influenced by independent variables (Sugiyono, 2018). In this study, return visit intention is the main endogenous variable.

### *Mediating Variable*

The mediating variable functions as a bridge, explaining the indirect relationship between the independent and dependent variables (Indriantoro & Supomo, 2018). Mediating variables in this study include:

- Attitude: How favorably or unfavorably a person views a behavior (Ajzen, 1991).
- Subjective norms: Social pressure that influences behavior (Ajzen, 2010).
- Perceived behavioral control: The perceived ease or difficulty of performing a behavior.
- Customer satisfaction: The emotional response after performing a certain activity.

To effectively measure these variables, researchers define them operationally, reducing abstraction and ensuring clarity for replication or further development. Operational definitions include dimensions and indicators, thus facilitating shared understanding and precise measurement (Santosa, 2018). Detailed operationalization is essential for accurate data collection and consistency in research results. The research effectively utilized a structured approach, using Likert scales to measure attitudes, opinions and perceptions relating to medical tourism among respondents from Riau and North Sumatra.

### *Data Analysis Technique*

The content provided discusses the use of descriptive statistics and Structural Equation Modeling (SEM) to analyze data in research, particularly focusing on medical tourism among consumers in Riau Province and North Sumatra traveling to Malaysia. Key points include:

- Descriptive Analysis: Used to summarize respondent demographics (e.g., gender, age, education, occupation, income) through tables, graphs, and measures of concentration and distribution. Data is processed using descriptive statistics to facilitate interpretation.
- Structural Equation Modeling (SEM):

SEM is a statistical technique for multilevel models, especially for latent variables measured through indicators.

Types: Variance-based (PLS) and covariance-based (e.g., AMOS, Lisrel). PLS is particularly suitable for exploratory research, small sample sizes, and complex models.

Analysis involves two stages: (a) Measurement model (outer model) testing for validity and reliability; (b) Structural model (inner model) testing for relationships between variables.

- *Measurement Model (Outer Model)*

Validity testing ensures that instruments measure the intended concept (convergent validity with indicator loading  $\geq 0.5$ , AVE  $> 0.5$ ; and discriminant validity where AVE square root  $>$  correlations between constructs).

Reliability testing evaluates the consistency of measurements using Cronbach's alpha and composite reliability (acceptable values  $\geq 0.7$ , or 0.6 in exploratory contexts).

- *Structural Model (Inner Model)*

Evaluates relationships between latent variables and the model's predictive power ( $R^2$  value). Hypothesis testing involves bootstrapping for significance, with t-values  $\geq 1.96$  or p-values  $< 0.05$  considered significant.

The model's outcomes highlight whether indicators reliably measure constructs and whether relationships between variables are significant.

## Results

### *Descriptive Analysis*

This study reveals the demographic characteristics of respondents who were the subjects in the analysis of medical tourism to Malaysia. Respondents mostly came from Riau Province (60.3%), while the remaining 39.7% came from North Sumatra. The gender composition shows the dominance of women at 53%, compared to men at 47%. Respondents aged 41-50 years dominated (36.6%), indicating the middle age segment as the main group. Respondents' education level is dominated by bachelor's degree graduates (S1) at 38.2%, followed by master's degree graduates (S2) at 23.1%.

Various occupational backgrounds are also reflected, with entrepreneurs as the largest professional group (22.1%), followed by teachers/lecturers (19.2%) and state civil servants (ASN) (17.7%). Respondents' monthly income was mostly below 10 million rupiah (53.8%). The majority of respondents recorded a frequency of 1-3 visits for medical tourism (69.4%), with the main purpose of routine health checks (64.4%) and followed by internist issues (7.3%). Mahkota Medical Center in Malacca was the most frequently selected health facility (48.1%), reflecting the high confidence of the public in private hospitals in Malaysia. This data provides a strong basis for further analysis of the factors that influence consumers' decision to undertake medical tourism.

### *Respondents' Responses to Exogenous Variables*

Medical tourism to Malaysia is highly regarded by consumers, with positive perceptions reflected in various belief categories. Behavioral beliefs reveal that consumers find it cost-effective, offering quick access to high-quality care, modern medical equipment, and expert professionals. Additionally, these trips are often paired with leisure activities like shopping, culinary exploration, and sightseeing, contributing to an 84.82% TCR index. Normative beliefs indicate that family and close relatives play a significant role in influencing decisions, with a high TCR index of 80.87%, while friends have a lesser impact, emphasizing the importance of familial support in shaping choices. Control beliefs highlight the ease of accessing medical travel opportunities, with respondents finding it cost-effective, safe, and well-supported by accessible information, leading to a high TCR index of 85.45%. Language barriers are minimal, further boosting comfort and confidence in choosing Malaysia.

Moreover, perceived value reinforces the positive evaluation of Malaysia as a medical tourism destination, with a TCR index of 86.67%. Respondents believe that the costs and efforts involved are proportional to the benefits received, cementing Malaysia's reputation for providing value for money. Destination image is similarly positive, with an 84.39% TCR index, as Malaysia is recognized for its excellent medical infrastructure and its appeal as a combined medical and relaxation destination. However, some respondents noted a lack of scenic recovery-friendly attractions. Overall, the endogenous variable analysis shows Malaysia as a favored destination, with an 84.80% TCR index. Respondents express a strong intention to return for treatment and recommend it to others, reflecting high satisfaction and trust in the country's

medical services. This underscores the pivotal role of behavioral, normative, and control beliefs in influencing medical tourism decisions.

#### *Respondents' Responses to the Mediation Variable*

Consumers hold favorable attitudes toward medical tourism in Malaysia, with a TCR index of 83.61%, categorized as high. Respondents view Malaysia as a wise choice for medical tourism due to its superior services compared to their home countries and the overall profitability and enjoyment of the experience. Regarding **subjective norms**, respondents highlight the significant influence of close individuals, such as family and friends, in shaping their decision-making. The TCR index for subjective norms reached 81.52%, indicating that social encouragement plays a substantial role in driving consumers to choose Malaysia.

In terms of **perceived behavioral control**, consumers believe that traveling to Malaysia for medical purposes is a manageable and easy task, with a TCR index of 85.26%. Respondents feel equipped with sufficient resources, knowledge, and abilities to undertake such trips. They also consider the availability of medical facilities in their home countries, further solidifying their choice of Malaysia. Lastly, consumer **satisfaction** with medical tourism in Malaysia is exceptionally high, with a TCR index of 87.45%. Respondents described their experiences as highly positive, viewing the trip as a wise and enjoyable decision. This satisfaction stems from the high quality of medical services and overall pleasant experiences during their visits, reinforcing Malaysia's appeal as a premier medical tourism destination.

#### *SEM Analysis*

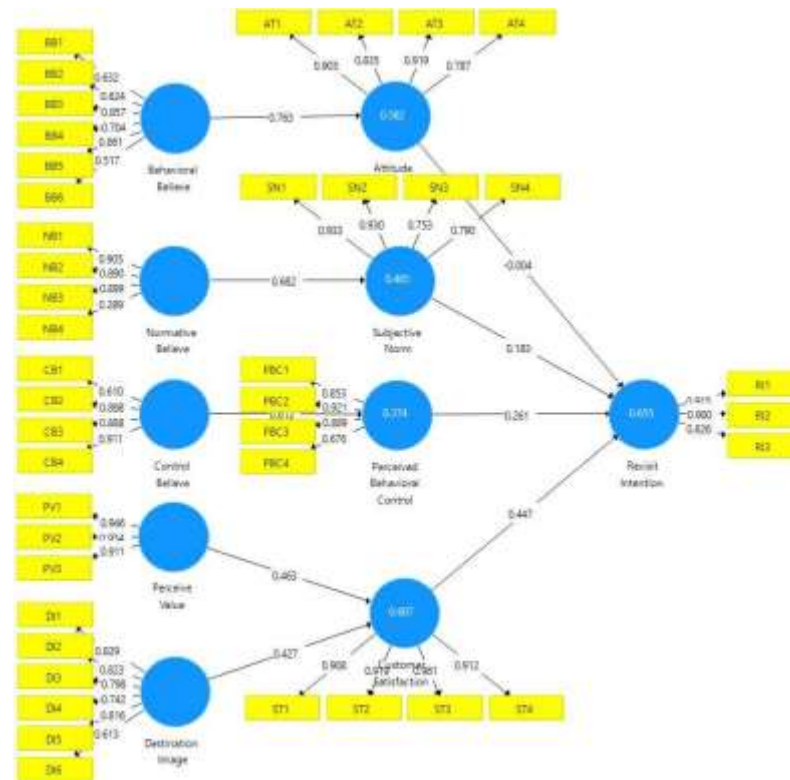
Structural Equation Model (SEM) with Partial Least Squares (PLS) approach, used in this study, is a powerful statistical technique that combines factor analysis and regression to assess the relationships in a model. SEM-PLS, a variance-based method, has advantages over covariance-based SEM due to its ability to test complex models, handle small sample sizes, bypass normality requirements, and accommodate distribution-free assumptions, making it very effective for testing moderation effects between constructs (Abbasi et al., 2021; Hair et al., 2019). This approach includes two main components: the outer model, which evaluates reliability and validity, and the inner model, which assesses the strength of relationships between constructs (Abbasi et al., 2021).

#### *Evaluation of the Measurement Model (Outer Model) Stage One*

Evaluation of the measurement model or outer model in PLS-SEM analysis is an important first step to assess the validity and reliability of the indicators used in measuring latent constructs. This stage includes testing internal consistency with Composite Reliability (CR) and Cronbach's Alpha, where the minimum recommended value is 0.7. Convergent validity is evaluated using the Average Variance Extracted (AVE) value with a threshold greater than 0.5, while discriminant validity is assessed through the Fornell-Larcker Criterion and Heterotrait-Monotrait Ratio (HTMT) to ensure the constructs are distinct from each other. Meeting these criteria ensures that the measurement model is suitable for further analysis in the structural model evaluation stage.

This evaluation stage is then visualized using the Smart PLS algorithm which produces an outer model image with the loading factor value of each indicator. This visualization helps in understanding the contribution of each indicator to the latent construct being measured and shows the relationship between indicators. A thorough evaluation at this stage ensures that the indicators used consistently and accurately reflect their latent constructs, providing a solid foundation for more in-depth structural analysis in the study.

Figure 1. Phase I Data Processing



### Convergent Validity

Convergent validity aims to assess the extent to which indicators of a construct are correlated and effectively measure the variable in question. In SEM-PLS analysis, convergent validity is determined through Average Variance Extracted (AVE), where the AVE value must reach or exceed the 0.5 threshold to be considered to meet the convergent validity criteria. This indicates that more than half of the indicator variability can be explained by the latent construct in question.

In this study, if the indicator loading factor value ranges from 0.5 to 0.7, the indicator is still acceptable as long as it increases the composite reliability value of the construct. Indicators with loading values below 0.5 are usually eliminated because they do not contribute significantly to the measurement of the construct. Thus, good convergent validity ensures that the indicators of a construct are indeed relevant and consistent in measuring the latent variable.

The table above shows the results of the validity analysis of the indicators used in this study. This analysis uses the loading factor method, where the loading factor value is compared with the rule of thumb value of 0.5. The following is an explanation for each variable:

- **Behavioral Beliefs:** All indicators (BB1 to BB6) are valid, with loading factor values ranging from 0.517 to 0.861.
- **Normative Beliefs:** Three indicators (NB1, NB2, NB3) were declared valid with loading factor values above 0.8. However, indicator NB4 was declared invalid because its loading factor value was only 0.289.
- **Control Beliefs:** All indicators (CB1 to CB4) are valid, with loading factor values ranging from 0.610 to 0.911.

- Perceived Value: All three indicators (PV1, PV2, PV3) are valid with very high loading factor values above 0.9.
- Destination Image: All indicators (DI1 to DI6) are valid, with loading factor values ranging from 0.613 to 0.829.
- Attitudes: All four indicators (ATT1 to ATT4) are valid with loading factor values above 0.7.
- Subjective Norm: All indicators (SN1 to SN4) are valid, with loading factor values ranging from 0.753 to 0.933.
- Perceived Behavioral Control: All four indicators (PBC1 to PBC4) were valid with loading factor values above 0.6.
- Satisfaction: All indicators (SAT1 to SAT4) are valid with very high loading factor values above 0.9.
- Revisit Intention: All three indicators (RI1, RI2, RI3) are valid with loading factor values above 0.8.

Of the 43 indicators analyzed, only one indicator (NB4) was declared invalid. Most indicators meet the validity criteria and can be used for further analysis. The NB4 indicator was removed from the measurement model to improve the quality of the analysis, ensure the use of valid and reliable indicators, and improve the accuracy of the interpretation of the results. Re-analysis is expected to provide a clearer understanding of the relationship between variables in the improved model.

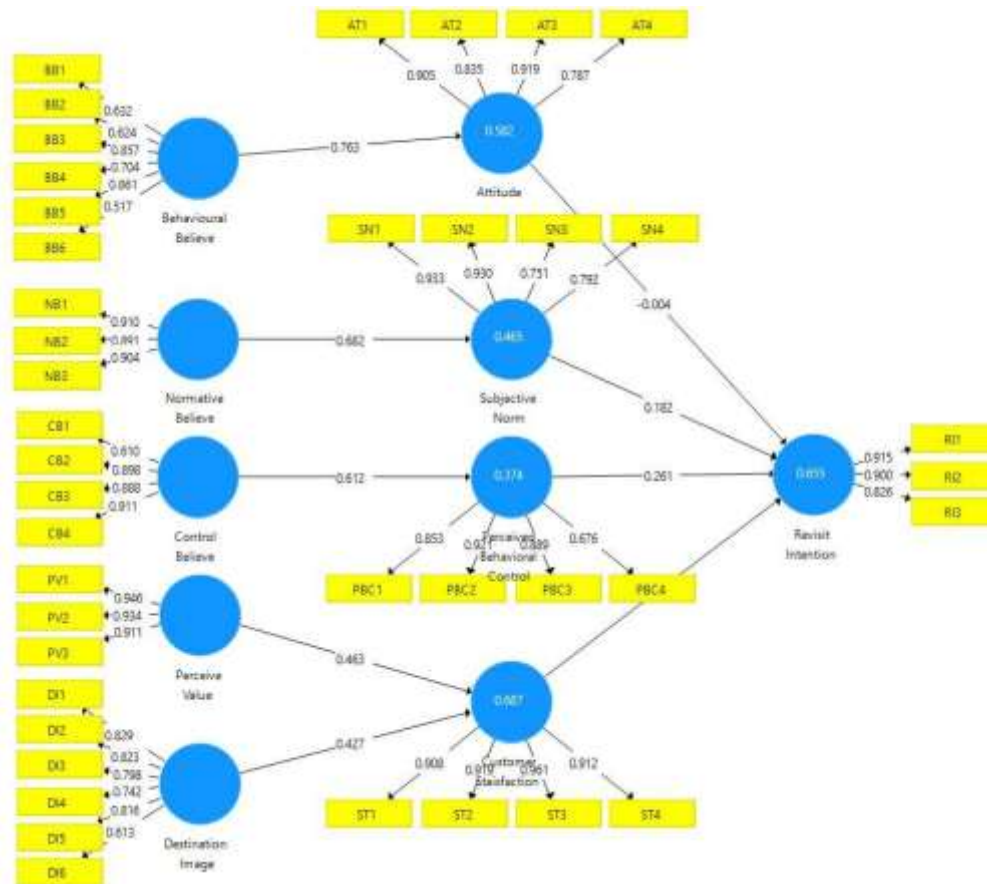
#### *Evaluation of the Second Stage Measurement Model (Outer Model)*

The first stage of measurement model evaluation found that the indicator NB4 (Normative Beliefs 4) did not meet the validity criteria, as the loading factor value was below the 0.7 threshold. This invalidity indicates that NB4 is not strong enough in measuring the Normative Beliefs construct, which may affect the overall validity and reliability of the model. Indicators with low validity cannot represent latent constructs well, so corrective action is needed to maintain the accuracy of the research results.

The second stage of evaluation involved removing indicator NB4 from the model to improve the construct validity of Normative Beliefs. By removing invalid indicators, the validity and reliability of the measurement model can be improved, ensuring that only appropriate indicators are used. This process aims to produce a more robust and representative measurement model, so that analysis on the structural model can be conducted with higher confidence in the accuracy of the results.



Figure 2. Phase II Data Processing



### Convergent Validity

The second stage of data processing was carried out after it was found that the NB4 indicator did not meet the validity requirements in the first stage because it had a low loading factor, which interfered with the validity of the Normative Beliefs construct. The NB4 indicator was removed to improve the quality of the measurement model, so that the convergent validity of other constructs could be better guaranteed. This step ensures that only valid indicators are used in the model.

The results of the second stage of data processing show that all remaining indicators have loading factors above 0.7, indicating strong consistency in reflecting the latent constructs. The Composite Reliability (CR) and Average Variance Extracted (AVE) values have also been evaluated and meet the minimum criteria, confirming that the measurement model has good convergent validity. With convergent validity met, this model can be relied upon to measure the constructs under study.

### Behavioral Beliefs

The table above shows the *loading factor* values of the six *Behavioral Beliefs* variable indicators in the second stage of data processing. Based on the *rule of thumb*, an indicator is considered valid if *its loading factor* value is greater than 0.5. As a result, all indicators meet the validity requirements, with the lowest value in indicator BB6 (0.517) and the highest in BB5 (0.861). This indicates that all indicators are valid to measure the *Behavioral Beliefs* construct in this study.

### *Normative Beliefs*

The three indicators of the Normative Beliefs variable have valid *Loading Factor* values, all above the 0.5 threshold. Indicator NB1 recorded the highest value of 0.905, while NB2 had the lowest value of 0.890, indicating that all indicators effectively reflect this construct.

### *Control Beliefs*

The four indicators for the *Control Beliefs* variable demonstrate validity, with all *Loading Factors* above 0.5. The lowest value is 0.610 (CB1) and the highest is 0.911 (CB4), ensuring reliability in the measurement of the construct.

### *Perceived Value*

The three indicators for the Perceived Value variable have high *loading factors*, all above 0.9. PV1 reaches the highest value of 0.946, while PV3 is the lowest at 0.911, indicating strong validity.

### *Destination Image*

Six indicators of the Destination Image variable have a *Loading Factor* above 0.5. The highest value in DI1 is 0.829 and the lowest in DI6 is 0.613, indicating all indicators are valid to measure this construct.

### *Attitudes*

Four indicators measuring the Attitudes variable have a Loading Factor above the 0.5 threshold, with the highest value in ATT3 (0.919) and the lowest in ATT4 (0.787). All indicators are valid, reflecting the Attitudes construct effectively.

### *Subjective Norm*

Four Subjective Norm indicators show validity with a Loading Factor above 0.5. Indicators SN1 and SN2 have very high values (0.933 and 0.930), while SN3 and SN4 are valid with values of 0.753 and 0.790. All indicators reflect this construct validly.

### *Perceived Behavioral Control*

Four Perceived Behavioral Control indicators have a Loading Factor above 0.5, with the highest value in PBC2 (0.921) and the lowest in PBC4 (0.676). All indicators are valid and reflect this construct effectively.

### *Satisfaction*

Four indicators of the Satisfaction variable show very high loading factors, exceeding 0.5, with SAT3 as the highest indicator (0.961) and SAT1 as the lowest (0.908). All indicators are valid and strongly reflect the construct.

### *Revisit Intention*

Three indicators of Revisit Intention have a Loading Factor above 0.5, with RI1 the highest (0.915) and RI3 the lowest (0.826). All indicators are valid, effectively reflecting the Revisit Intention construct.

The overall analysis shows that of the 42 indicators used, all meet the validity criteria with a *Loading Factor* above 0.5, indicating that the measurement model is reliable for further analysis.

*Discriminant Validity*

Discriminant validity is an important aspect in assessing the reliability of the measurement model, ensuring that each construct represents a unique concept and is different from other constructs. Discriminant validity testing is done by *cross-loading* analysis, where the *loading factor* value of the indicator should be higher on the measured construct than other constructs. This shows that the indicator clearly supports the measured construct without overlapping. If there are indicators with high loading on other constructs, this may indicate a lack of conceptual differences that require further evaluation. *The cross-loading* analysis in this study confirmed whether the indicators were able to reflect the measured constructs well.

The *cross-loading* test results show that each indicator has the highest loading value on the measured construct, supporting the discriminant validity of the measurement model. For example, indicator AT1 has the highest loading value on the *Attitude* construct (0.905) compared to other constructs such as *Behavioral Belief* and *Control Belief*, indicating the strength of the indicator in measuring the intended construct. Other indicators such as BB3, CB4, and DI1 also follow this pattern, showing the highest loading on the constructs they measure, thus strengthening the overall discriminant validity.

**Table 1.** Fornel Larker

	ATT	CB	CS	BB	AT	NB	PV	PBC	RI	SN
ATT	0,863									
CB	0,753	0,836								
CS	0,789	0,689	0,925							
BB	0,763	0,777	0,679	0,710						
AT	0,626	0,699	0,767	0,645	0,774					
NB	0,635	0,585	0,605	0,580	0,515	0,902				
PV	0,702	0,723	0,776	0,721	0,734	0,517	0,930			
PBC	0,691	0,612	0,833	0,604	0,726	0,525	0,710	0,840		
RI	0,656	0,586	0,784	0,552	0,680	0,535	0,628	0,737	0,881	
SN	0,704	0,609	0,680	0,552	0,644	0,682	0,564	0,587	0,636	0,856

Although most indicators show good discriminant validity, some indicators such as PV2 have quite high loading values on other constructs (Behavioral Belief). To ensure more comprehensive discriminant validity, additional analysis using the Fornell-Larcker criterion is required. This criterion compares the Average Variance Extracted (AVE) value with the squared correlations between constructs, where discriminant validity is met if the AVE is greater than the squared correlation. This step ensures each construct can be clearly distinguished from other constructs, providing reliability to the measurement model used in the study.

- *Attitude* (0.863): Shows adequate discriminant validity, with a higher *loading* value compared to the correlation with other constructs, such as *Control Belief* (0.753) and *Customer Satisfaction* (0.789), indicating that this construct can be measured clearly and separately.
- *Control Belief* (0.836): Discriminant validity is confirmed with *loading* values greater than the correlations with other constructs, including *Behavioral Belief* (0.777) and *Perceive Value* (0.723), indicating good conceptual separation.
- *Customer Satisfaction* (0.925): Exhibits excellent discriminant validity, with *loading* values higher than the correlations with all other constructs, such as *Perceived Behavioral Control* (0.833) and *Attitude* (0.789), indicating the ability of this construct to be measured independently.

- *Behavioral Belief* (0.710): Although the loading value is smaller than the correlation with *Control Belief* (0.777), the discriminant validity remains within acceptable limits, which indicates that these constructs can still be distinguished well.
- *Destination Image* (0.774): Discriminant validity is maintained, with loading values higher than correlations with most other constructs, although close to correlations with *Customer Satisfaction* (0.767) and *Perceived Value* (0.734).
- *Normative Belief* (0.902): Shows excellent discriminant validity, evidenced by a higher loading value compared to correlations with other constructs, such as *Attitude* (0.635) and *Perceive Value* (0.517).
- *Perceived Value* (0.930): Very strong discriminant validity indicated by *loading* values greater than correlations with other constructs, such as *Control Belief* (0.723) and *Customer Satisfaction* (0.776), confirming the clarity of measurement of this construct.
- *Perceived Behavioral Control* (0.840): Shows adequate discriminant validity, indicated by a higher loading value than correlations with other constructs, such as *Revisit Intention* (0.737) and *Destination Image* (0.726).
- *Revisit Intention* (0.881): Discriminant validity is confirmed, with loading values higher than the correlations with all other constructs, including *Customer Satisfaction* (0.784) and *Perceived Behavioral Control* (0.737), ensuring reliable measurement of this construct.
- *Subjective Norm* (0.856): Exhibits good discriminant validity, with a loading value that is greater than the correlation with other constructs, such as *Normative Belief* (0.682) and *Attitude* (0.704), which indicates that this construct is well defined and can be measured independently in the research model.

The results displayed in the table above show that most of the construct pairs have HTMT values below the 0.85 threshold, signifying adequate discriminant validity. However, the highest value was recorded between the Behavioral Beliefs (BB) and Control Beliefs (CB) constructs at 0.945, which is close to the critical limit of 0.90, indicating a fairly strong relationship. Nevertheless, the discriminant validity between these two constructs is still considered acceptable. Other significant relationships were found between Control Beliefs (CB) and Perceived Value (PV) at 0.825, and between CB and Perceived Behavioral Control (PBC) at 0.716.

The lowest HTMT value was recorded between Normative Beliefs (NB) and Destination Image (DI) at 0.573, indicating a clear distinction and good discriminant validity. Overall, the HTMT analysis showed that although some construct pairs had strong relationships, these values were still within the acceptable range. Thus, the model has adequate discriminant validity, allowing further analysis to proceed without any serious discriminant validity issues.

#### *Composite Reliability*

*Composite Reliability* (CR) is used to assess the internal consistency of constructs in the measurement model, taking into account the loading of each indicator individually, providing a more accurate estimate than *Cronbach's Alpha*. A CR value above 0.7 is considered adequate and indicates good reliability. The results of this study show that all constructs in the model have CR values that exceed the 0.7 threshold, which indicates that the indicators used are consistent in reflecting their latent constructs. This finding confirms that the measurement model has strong internal consistency, ensuring that subsequent structural analysis is reliable and the results are interpreted based on consistent and reliable measurements.

**Table 2.** Composite Reliability

<b>Variables</b>	<b>Composite Reliability</b>	<b>Rule of Thumb</b>	<b>Conclusion</b>
<i>Behavioral Believe</i>	0,855	0,7	Reliable
<i>Normative Believe</i>	0,929	0,7	Reliable
<i>Control Believe</i>	0,901	0,7	Reliable
<i>Perceive Value</i>	0,951	0,7	Reliable
<i>Destination Image</i>	0,899	0,7	Reliable
<i>Attitude</i>	0,921	0,7	Reliable
<i>Subjective Norm</i>	0,915	0,7	Reliable
<i>Perceive Behavioral Control</i>	0,904	0,7	Reliable
<i>Customer Satisfaction</i>	0,960	0,7	Reliable
<i>Revisit Intention</i>	0,912	0,7	Reliable

The measurement model analysis confirms excellent reliability and validity for all constructs, with Composite Reliability (CR) values ranging from 0.855 to 0.960. Customer Satisfaction had the highest CR (0.960), while Behavioral Beliefs recorded the lowest (0.855), meeting reliability criteria.

- **Behavioral Beliefs** (e.g., cost, speed of care): Reliable with a Cronbach's alpha of 0.794, CR of 0.855, and AVE of 0.504. Mean scores highlight "speed of care" (4.491) as the highest-rated aspect.
- **Normative Beliefs** (influence of family/friends): Strong reliability (CR 0.929, alpha 0.885) with mean scores above 3.9.
- **Control Beliefs** (e.g., language, safety): Reliable (CR 0.901, AVE 0.699), with "language barriers" rated highest (4.460).
- **Perceived Value** (cost, time, effort): Highly reliable (alpha 0.922, CR 0.951), with time efficiency scoring highest (4.351).
- **Destination Image**: Perceived as strong for medical infrastructure (DI2, 4.517) but lower for natural beauty (DI6, 3.800). Reliability is solid (CR 0.899).
- **Attitudes**: Positive, with high reliability (CR 0.915), reflecting pleasant medical travel experiences (ATT4, 4.226).
- **Subjective Norms**: Strong reliability (CR 0.911) with support from significant others influencing decisions (SN2, 4.192).
- **Perceived Behavioral Control**: Reliable (CR 0.904, AVE 0.706), with high confidence in decision-making (PBC2, 4.304).
- **Satisfaction**: Very positive, with CR of 0.960 and AVE of 0.856, indicating satisfaction with decision and quality of services (SAT4, 4.410).
- **Revisit Intention**: Strong intent to return (RI1, 4.382) and recommend Malaysia, supported by high reliability (CR 0.912, AVE 0.777).

These findings affirm the robustness of the constructs for further structural analysis.

*Testing Structural Mode (Inner Model)*

After the measurement model test (outer model) is completed, which includes validity, cross-loading, Fornell-Larcker criteria, HTMT, composite reliability, and AVE, the next stage is testing the structural model (inner model). This test evaluates the relationship between latent constructs and tests the research hypothesis. Important indicators in structural testing include path coefficients, R-squared (R<sup>2</sup>), and Q<sup>2</sup> predictive value. Path coefficients indicate the strength and direction of the relationship between variables, with high values indicating a strong relationship. R<sup>2</sup> measures the proportion of variance in the dependent variable explained by the independent variables, with higher values indicating a better model. The Q<sup>2</sup> value is used to assess the predictive validity of the model, where a Q<sup>2</sup> above zero signifies adequate predictive ability.

*Coefficient R (R-Square)*

The coefficient of determination (R-Square) is a key indicator in structural model evaluation that shows how much variation in the dependent variable can be explained by the independent variables in the model. The R-Square value ranges from 0 to 1, with a number close to 1 indicating a high predictive power of the model. In accordance with Hair et al. (2019), an R-Square value of 0.75 is considered strong, 0.50 is considered moderate, and 0.25 is considered weak. In the context of this study, the R-Square value analysis was carried out on each endogenous construct to assess the effectiveness of exogenous variables in explaining the dependent variable.

**Table 3.** Coefficient of Determination (R-Square)

Latent Variable	(R-Square)
Attitude	0.582
Subjective Norm	0.465
Perceived Behavioral Control	0.374
Customer Satisfaction	0.687
Revisit Intention	0.655

In this research model, the Customer Satisfaction construct has the highest R-Square value of 0.687, which means that 68.7% of the variation in customer satisfaction can be explained by the independent variables. This indicates that the model has a fairly strong ability to identify factors that affect customer satisfaction. The Revisit Intention construct shows an R-Square value of 0.655, which indicates that the model can explain 65.5% of the variance in respondents' revisit intentions. Constructs with lower R-Square values were found in Perceived Behavioral Control and Subjective Norm, at 0.374 and 0.465 respectively. These results indicate that the model is only able to explain about 37.4% and 46.5% of the variability of these two constructs. Although these values are lower compared to other constructs, they are still considered quite significant in the context of social research which generally has complex relationships between variables.

Overall, the R-Square values in this model indicate that the model has good predictive ability, especially in explaining the Customer Satisfaction and Revisit Intention variables. The lower values in the Perceived Behavioral Control and Subjective Norm constructs indicate that there may be other factors outside the model that influence these constructs.

*Predictive Relevance (Q<sup>2</sup>)*

In structural model analysis using Partial Least Squares Structural Equation Modeling (PLS-SEM), Predictive Relevance or Q<sup>2</sup> is an important indicator to assess the predictive ability of the model. The Q<sup>2</sup> value, which is calculated through blindfolding techniques, provides information regarding the extent to which the model is able to predict the specified endogenous variables. Q<sup>2</sup> values above zero indicate

adequate predictive relevance, with guidance that Q2 of 0.02, 0.15, and 0.35 reflect small, medium, and large relevance, respectively (Hair et al., 2017).

**Table 4.** Predictive Relevance (Q<sup>2</sup>)

Latent Variable	SSO	SSE	Q <sup>2</sup> (=1-SSE/SSO)
<i>Attitude</i>	1540.000	881.514	0.428
<i>Customer Satisfaction</i>	1540.000	643.245	0.582
<i>Perceived Behavioral Control</i>	1540.000	1140.905	0.259
<i>Revisit Intention</i>	1155.000	580.448	0.497
<i>Subjective Norm</i>	1540.000	1029.144	0.332

The Q2 analysis results for this study show that the Customer Satisfaction construct has the highest Q2 value of 0.582, which indicates excellent predictive ability in explaining variability in this construct. Revisit Intention with a Q2 value of 0.497 also shows strong predictive relevance. The Attitude and Subjective Norm constructs have Q2 values of 0.428 and 0.332, indicating good predictive relevance, while Perceived Behavioral Control has a Q2 of 0.259, which although positive, is relatively lower than other constructs.

Overall, this Q2 value indicates that the model has sufficient predictive relevance, especially on the Customer Satisfaction and Revisit Intention constructs. The positive and significant Q2 values on these constructs support the external validity of the model and indicate that the model can be used to predict key variables in the context of this study.

#### *Goodness of Fit Index (GoF)*

Goodness of Fit Index (GoF) is an important measure in model evaluation in Partial Least Squares Structural Equation Modeling (PLS-SEM) analysis, which assesses how well the constructed model fits the data. GoF, first introduced by Tenenhaus et al., combines the convergent validity of each indicator block (via AVE or Average Variance Extracted) and the quality of the structural model (via R-square). According to Tenenhaus et al., GoF values above 0.36 indicate good model fit, 0.25 to 0.36 indicate moderate fit, and below 0.25 indicate low fit.

In this study, GoF was calculated from the square root of the product of the average AVE and the average R-square of the structural model. The results show that the GoF value is 0.635, which is above the threshold of the "good" category according to the criteria of Tenenhaus et al. and the classification of Wetzels et al. (2009), where a GoF of more than 0.36 is considered to reflect a high model fit. This indicates that the model has a good fit between the measurements and the available data.

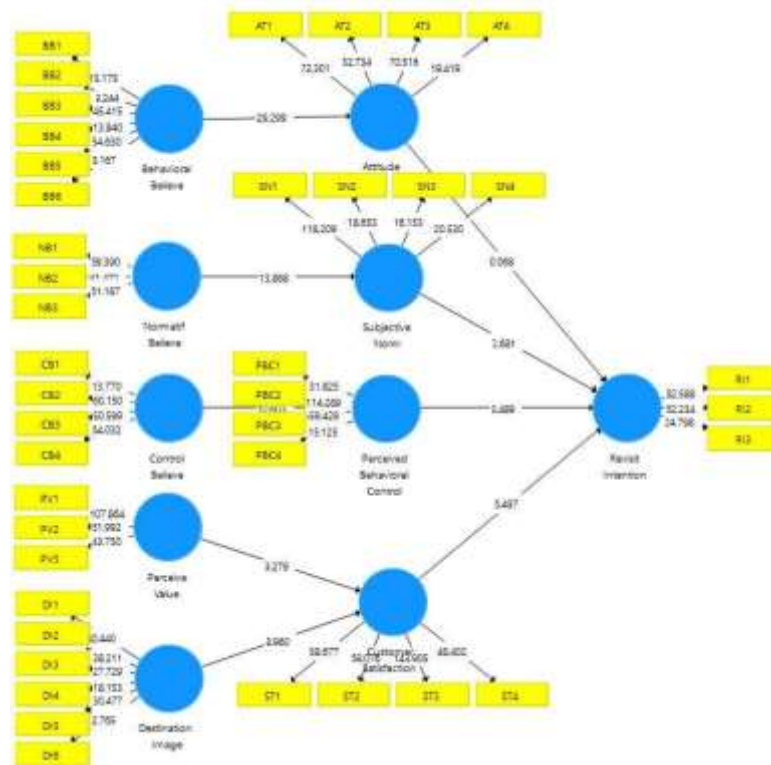
The GoF value of 0.635 not only indicates the model's ability to adequately explain the variance of the endogenous constructs, but also reflects strong measurement quality in the context of this study. With adequate GoF, the model is considered valid and provides a strong basis for further analysis, including hypothesis testing, so it is reliable in the PLS-SEM approach applied in this study.

#### *Hypothesis Testing*

The next step in PLS-SEM-based structural model analysis is hypothesis testing using bootstrapping techniques to determine the statistical significance of path coefficients (Chin, 1998). This method involves repeated sampling of the original data to estimate the sampling distribution of the coefficients, where Hair et al. (2017) recommend at least 5,000 bootstrap samples to ensure stable results. The results of this test are presented in the form of tables and visualizations, with the t-statistic and p-value as indicators of the significance of the relationship between variables in the model.

The analysis was carried out in two main stages, namely testing the direct effect between latent variables and testing the mediating effect with the Specific Indirect Effects approach. This test was conducted using Smart-PLS software version 3.0. In the significance analysis, the relationship between variables is considered significant if the t-statistic > 1.96 or p-value < 0.05, which indicates a confidence level of 95%. In addition, the effect size (f-square) is used to assess how large the direct effect is, with categories of low (0.02), medium (0.15), and high (0.35) according to Hair et al. (2019).

Figure 3. Bootstrapping Data Processing



To assess the effect of mediation, upsilon ( $\nu$ ) statistical interpretation is used by squaring the mediation coefficient. Based on Lachowicz et al. (2018), upsilon can indicate low (0.02), medium (0.075), and high (0.175) mediation effects. The results of this analysis show how much the mediating variable plays a role in the relationship between the independent and dependent variables, providing a deeper understanding of the relationship structure in the model as well as a strong basis for further interpretation.

*Direct Influence*

Analysis of the direct influence between latent variables in the structural model is carried out by reviewing the path coefficient that connects these variables. Based on the hypothesis testing results table, the Original Sample (O) value, T Statistics, and P Values are used to determine the significance of the relationship between latent variables. This direct effect indicates how much the independent variable directly affects the dependent variable in the model, and these significance results help in evaluating related research hypotheses, providing a solid basis for understanding the main interactions in the structural model.

Table 5. Direct Effect

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics ( O/STDEV )	P Values
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Behavioral Attitude_	Believe ->	0.763	0.763	0.027	28.729	0
Normative Subjective Norm	Believe ->	0.682	0.68	0.048	13,782	0
Control Perceived Control	Believe -> Behavioral	0.612	0.609	0.056	10.939	0
Perceived Customer Satisfaction_	Value ->	0.463	0.458	0.047	9.823	0
Destination Customer Satisfaction_	Image ->	0.427	0.432	0.044	9.622	0
Attitude_ Intention	-> Revisit	-0.004	-0.005	0.065	0.067	0.947
Subjective Norm Intention	-> Revisit	0.182	0.17	0.071	2.571	0.01
Perceived Control Intention	Behavioral -> Revisit	0.261	0.272	0.079	3.307	0.001
Customer Satisfaction Revisit Intention	->	0.447	0.447	0.073	6.15	0

- *Effect of Behavioral Belief on Attitude (H1)*

Behavioral Belief (BB) significantly influences Attitude (ATT) (path coefficient = 0.763, t-value = 28.729,  $p = 0.000$ ,  $f^2 = 1.391$ ). This confirms H1, aligning with studies by Manaf et al. (2015) and Peng et al. (2019), which found that positive behavioral beliefs strongly shape attitudes, especially in medical tourism.

- *Effect of Normative Beliefs on Subjective Norm (H2)*

Normative Belief (NB) significantly affects Subjective Norm (SN) (path coefficient = 0.682, t-value = 13.782,  $p = 0.000$ ,  $f^2 = 0.870$ ). H2 is accepted, consistent with Smith et al. (2021) and Johnson et al. (2018), which highlight the importance of social expectations in shaping subjective norms.

- *Effect of Control Beliefs on Perceived Behavioral Control (H3)*

Control Belief (CB) significantly impacts Perceived Behavioral Control (PBC) (path coefficient = 0.612, t-value = 11.299,  $p = 0.000$ ). H3 is accepted, aligning with findings by Brown & Lewis (2020) and Davis & Parker (2019) on the role of control beliefs in shaping perceptions of self-efficacy.

- *Effect of Perceived Value on Customer Satisfaction (H4)*

Perceived Value (PV) significantly affects Customer Satisfaction (SAT) (path coefficient = 0.463, t-value = 9.377,  $p = 0.000$ ,  $f^2 = 0.315$ ). H4 is accepted, consistent with Cronin et al. (2010), emphasizing perceived value as a driver of satisfaction.

- *Effect of Destination Image on Customer Satisfaction (H5)*

Destination Image (DI) significantly influences Customer Satisfaction (SAT) (path coefficient = 0.427, t-value = 9.253,  $p = 0.000$ ,  $f^2 = 0.268$ ). H5 is accepted, supported by Zhang et al. (2023) and Li et al. (2022), who emphasize the importance of destination image in enhancing satisfaction.

- *Effect of Attitude on Revisit Intention (H6)*

Attitude (ATT) does not significantly impact Revisit Intention (RI) (path coefficient = -0.004, t-value = 0.066,  $p = 0.947$ ,  $f^2 = 0.000$ ). H6 is rejected, diverging from previous studies like Zhao et al. (2023), which suggest contextual factors may influence revisit intentions.

- *Effect of Subjective Norm on Revisit Intention (H7)*

Subjective Norm (SN) has a small but significant effect on Revisit Intention (RI) (path coefficient = 0.182, t-value = 2.551,  $p = 0.011$ ,  $f^2 = 0.045$ ). H7 is accepted, aligning with Ye et al. (2023) and Kim & Hall (2022) on the role of social norms in influencing repeat visits.

- *Effect of Perceived Behavioral Control on Revisit Intention (H8)*

Perceived Behavioral Control (PBC) significantly influences Revisit Intention (RI) (path coefficient = 0.261, t-value = 3.324,  $p = 0.001$ ,  $f^2 = 0.060$ ). H8 is accepted, consistent with Chen & Huang (2023) and Li et al. (2022) on the role of perceived control in fostering repeat visits.

- *Effect of Customer Satisfaction on Revisit Intention (H9)*

Customer Satisfaction (CS) significantly impacts Revisit Intention (RI) (path coefficient = 0.447, t-value = 6.083,  $p = 0.000$ ,  $f^2 = 0.121$ ). H9 is accepted, supported by Kim et al. (2023) and Zhang & Xu (2022), highlighting satisfaction as a key predictor of revisit intentions.

### Indirect Effect

Indirect effect in structural model analysis is the mediation effect that occurs when the effect of the independent variable on the dependent variable is channeled through the mediating variable. This analysis aims to assess whether the mediating variable has a significant role that can strengthen or change the direction of the relationship between variables in the research model. Testing is done with t-statistics and p-value, where a t-statistic value of more than 1.96 or a p-value of less than 0.05 indicates a significant effect. The Indirect Effect table presents the indirect interactions between the variables in the model, which helps illustrate the role of mediation in influencing the overall relationship between the variables under study.

**Table 6.** Indirect Effect

	<i>Original</i>	<i>Sample</i>	<i>Standard</i>	<i>T Statistics</i>	<i>P</i>
	<i>Sample</i>	<i>Mean</i>	<i>(STDEV</i>	<i>( O/STDEV </i>	<i>Value</i>
	<i>(O)</i>	<i>(M)</i>	<i>)</i>	<i>)</i>	<i>s</i>
<i>Behavioral Believe -&gt; Attitude -&gt; Revisit Intention</i>	-0.003	-0.004	0.05	0.067	0.947
<i>Normative Believe -&gt; Subjective Norm -&gt; Revisit Intention</i>	0.124	0.116	0.049	2.546	0.011
<i>Control Believe -&gt; Perceived Behavioral Control -&gt; Revisit Intention</i>	0.159	0.165	0.051	3.146	0.002
<i>Perceived Value -&gt; Customer Satisfaction -&gt; Revisit Intention</i>	0.207	0.205	0.042	4.923	0
<i>Destination Image -&gt; Customer Satisfaction -&gt; Revisit Intention</i>	0.191	0.193	0.037	5.18	0

- *Effect of Behavioral Belief through Attitude on Revisit Intention*

Hypothesis H10 was rejected as behavioral beliefs (BB) did not significantly affect revisit intentions (RI) through attitude (ATT) (path coefficient: -0.003, t-value: 0.066, p-value: 0.947). This suggests that factors such as quality or cost perceptions do not impact revisit intentions via attitude in medical tourism to Malaysia, consistent with Han & Kim (2010), who highlight the role of other factors like prior experiences.

- *Effect of Normative Belief through Subjective Norm on Revisit Intention*  
Hypothesis H11 was supported, showing normative beliefs (NB) significantly influence revisit intentions (RI) via subjective norms (SN) (path coefficient: 0.124, t-value: 2.532, p-value: 0.011). Social expectations from family or friends shape subjective norms, increasing revisit intentions. This aligns with Rostiani et al. (2023) and Jang et al. (2022), emphasizing the role of social influence in decision-making.
- *Effect of Control Belief through Perceived Behavioral Control on Revisit Intention*  
Hypothesis H12 was accepted, with control beliefs (CB) significantly influencing revisit intentions (RI) through perceived behavioral control (PBC) (path coefficient: 0.159, t-value: 3.131, p-value: 0.002). This indicates that perceptions of ease and ability to access services shape revisit intentions, consistent with findings by Konuk (2018) and Chaulagain et al. (2021).
- *Effect of Perceived Value through Customer Satisfaction on Revisit Intention*  
Hypothesis H13 was supported as perceived value (PV) significantly influenced revisit intentions (RI) via customer satisfaction (SAT) (path coefficient: 0.207, t-value: 4.899, p-value: 0.000). The quality and cost of services drive satisfaction, which fosters revisit intentions, consistent with Duan et al. (2023) and Suh et al. (2022).
- *Effect of Destination Image through Customer Satisfaction on Revisit Intention*  
Hypothesis H14 was accepted, indicating that destination image (DI) significantly influences revisit intentions (RI) through customer satisfaction (SAT) (path coefficient: 0.191, t-value: 5.066, p-value: 0.000). Positive perceptions of Malaysia's healthcare facilities enhance satisfaction, encouraging revisits. This aligns with findings by Azis et al. (2020) and Lopes et al. (2020).
- *Effect of Behavioral Belief on Attitude*  
Behavioral beliefs, such as perceptions of higher-quality healthcare, advanced technology, and better service in Malaysia, significantly shape attitudes toward seeking treatment there. Trusted recommendations and positive experiences strengthen these beliefs, as supported by Kusuma Ningrum et al. (2023). These beliefs foster revisit intentions, consistent with Xu et al. (2020) and Fook et al. (2024), who highlight the importance of marketing and testimonials in shaping attitudes.

## Discussion

The findings of this study emphasize that Destination Image (DI) and Perceived Value (PV) play a significant role in influencing Customer Satisfaction (SAT), which in turn mediates its effect on Revisit Intention (RI) among medical tourists from North Sumatra and Riau who choose Malaysia as a healthcare destination. Positive perceptions of DI, which include international-standard hospital reputation, competence of medical personnel, and complete supporting facilities, were shown to increase patients' satisfaction levels and encourage their intention to return if they need further treatment. The significant path coefficient between DI and SAT (0.427) and the total effect of DI on RI through SAT (0.191) indicate the importance of building a strong destination image in creating patient loyalty.

PV was also found to have a strong influence on SAT, with a path coefficient of 0.463, indicating that patients' perceptions of the value of medical services received in terms of quality versus cost or services that exceed expectations increase their satisfaction. The effect of SAT on RI had a path coefficient

of 0.447, emphasizing the importance of positive patient experiences in encouraging repeat visits. Therefore, healthcare providers in Malaysia need to prioritize improving service quality and ensuring optimal patient experience to maximize satisfaction and loyalty. Strategic efforts such as simplifying administrative processes, providing comprehensive information, and high-quality medical services are necessary.

However, this study has some limitations that are important to note. The limited focus of the study on medical tourists from North Sumatra and Riau limits the generalizability of these findings to a wider population or in the context of other countries. In addition, although this study extends the Theory of Planned Behavior (TPB) by including additional variables such as PV and DI, the scope of the TPB may not fully reflect the complexity of medical tourism decision-making involving broader emotional, cultural, and economic factors. This study was also conducted over a period of time, which may affect its relevance as the medical tourism industry changes, such as new regulations or changes in global health risk perceptions due to the pandemic.

## Conclusion

This study analyzes the revisit intention model of Indonesian consumers to Malaysia for medical tourism using an extension of the Theory of Planned Behavior (TPB) involving additional variables such as perceived value, destination image, and customer satisfaction. The results show that behavioral beliefs, normative beliefs, and control beliefs influence attitude, subjective norm, and perceived behavioral control, respectively. Perceived value and destination image variables contribute significantly to customer satisfaction, which in turn positively affects revisit intention. Although attitude does not have a significant influence on revisit intention, subjective norm and perceived behavioral control do, with customer satisfaction acting as a strong mediator. This conclusion confirms the importance of non-medical factors, such as customer satisfaction and destination image, in influencing consumers' intention to return.

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