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Review Article

Safety, Trust, and Behavioral Determinants in Medical Tourism Decision-Making: A Systematic Review and Integrated Framework

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Abstract

Background/ problem: Medical tourism has grown into a multibillion-dollar industry; however, research remains fragmented across isolated theoretical perspectives and is concentrated in limited geographic contexts. A key gap concerns how safety perceptions, trust, and psychological needs, rather than cost alone, shape cross-border healthcare decision-making.

Objective/ purpose: This systematic literature review synthesizes a decade of scholarship (2015–2025) to investigate the extent to which safety, trust, and psychological factors, rather than cost alone, drive cross-border healthcare decision-making. It proposes an integrated behavioral framework connecting the theory of planned behavior (TPB), protection motivation theory (PMT), self-determination theory (SDT), and trust theory across antecedents, mediating mechanisms, and outcomes to provide a more comprehensive theoretical lens for understanding medical tourism behaviors.

Design and Methodology: Following PRISMA guidelines, 34 peer-reviewed Scopus-indexed articles were systematically analyzed to examine behavioral intentions, service quality, satisfaction, and revisit intentions at international medical tourism destinations.

Results: The findings suggest that medical tourism is better understood as a safety and trust-driven coping response to healthcare system failure. Safety expectancy and waiting time appeared to be stronger decision drivers than cost considerations in the reviewed studies. Doctor interaction quality consistently emerged as the strongest service quality predictor across the reviewed studies.

Conclusion and Implications: This review indicates a potential reframing of medical tourism as a safety and trust-driven behavioral response, highlighting the relevance of the theories (TPB, PMT, SDT) and trust-based explanations. Providers should emphasize safety communication, marketers should strengthen cognitive trust signals, and policymakers should address the constraints of wait time. Future research should adopt cross-cultural and longitudinal designs to clarify these behavioral pathways across contexts.

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Medical tourism, the cross-border movement of patients seeking healthcare outside their country of residence, has grown into a multibillion-dollar industry that is reshaping global healthcare delivery (Dabaghi et al., 2022; Mahmud et al., 2021). Structural drivers, such as high domestic healthcare costs, unequal access to treatment, and the rising reputation of host country providers, explain the industry’s expansion (Abdul-Rahman et al., 2023; Jiang et al., 2024). The COVID-19 pandemic further elevated safety perceptions and clinical trust as central determinants of destination choice (Nabi et al., 2023). Digital transformation has added another layer, with patients increasingly relying on online reviews and social

media to form healthcare-related judgments and intentions (Balouchi & Aziz, 2024; Meng et al., 2023). However, a fundamental behavioral question remains unanswered: “why do patients cross borders for healthcare when domestic care is available?” Answering this question requires moving beyond economic and industry-level explanations toward an integrated account grounded in behavioral science that examines how risk perception, trust formation, motivation, and cognitive appraisal shape cross-border healthcare decision-making.

Despite extensive research, the medical tourism literature exhibits three distinct forms of fragmentation that hinder a comprehensive behavioral understanding. Epistemologically, key constructs such as “behavioral determinants” remain inconsistently defined across studies, as it is often unclear whether the focus is on cognitive antecedents (risk perception, trust), affective mechanisms (emotional attachment, satisfaction), social influence processes, or structural healthcare constraints. Conceptually, existing models lack integration; antecedents, mediating mechanisms, and behavioral outcomes are examined in isolation rather than as a coherent behavioral pathway (Cham et al., 2021; Nakhaeinejad et al., 2022). Methodologically, the dominance of cross-sectional designs limits the understanding of how decisions unfold over time, whereas the concentration of studies in Asian destinations restricts generalizability across cultural and healthcare system contexts. The early dominance of cost-based explanations in the literature reflects the structural realities of healthcare inequality in developing economies; however, this does not mean that cost is the primary behavioral driver. Indeed, the absence of an integrated behavioral framework linking antecedents, mediators, and outcomes represents the most critical gap in the field, constraining both theoretical development and practical guidance for healthcare providers and policymakers.

This systematic literature review addresses these gaps by synthesizing a decade of medical tourism scholarship (2015–2025) to develop an integrated behavioral framework. The “behavioral determinants” in this review are operationally defined as encompassing cognitive antecedents (risk perception, safety expectancy, trust), motivational processes (intrinsic and extrinsic motivation), and social influence mechanisms. These constructs are drawn from the theoretical frameworks most frequently employed across the reviewed studies: the theory of planned behavior (TPB) explains how attitudes and subjective norms shape behavioral intentions; protection motivation theory (PMT) accounts for how risk appraisal and coping efficacy drive health-protective decisions; self-determination theory (SDT) captures the motivational quality underlying cross-border healthcare choices; and trust theory addresses the relational dimension of provider-patient confidence. Together, these frameworks form a sequential pathway in which structural triggers activate cognitive appraisal, which mediates motivational and social processes before culminating in travel and treatment decisions.

Review Method

Aims of the Review

This systematic literature review aimed to synthesize empirical research on medical tourism from 2015 to 2025, focusing on behavioral intention, service quality, satisfaction, and revisit intentions. This review seeks to (1) identify and evaluate theoretical frameworks explaining medical tourist behavior, (2) examine how antecedents, mediating mechanisms, and behavioral outcomes interact in cross-border healthcare decision-making, and (3) characterize methodological patterns and identify research gaps in this domain. The following research questions guided this review:

1. Which theoretical frameworks dominate behavioral medical tourism research, and how do they interact?
2. How do safety perceptions, service quality, and trust shape medical tourism behavioral intentions?
3. What methodological patterns characterize this field, and what gaps warrant future investigation?

Design

This systematic literature review followed the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) guidelines (Page et al., 2021) to ensure methodological rigor and the transparency of the process. The review protocol was developed a priori to minimize bias and ensure comprehensive coverage of medical tourism literature.

Search Strategy and Data Sources

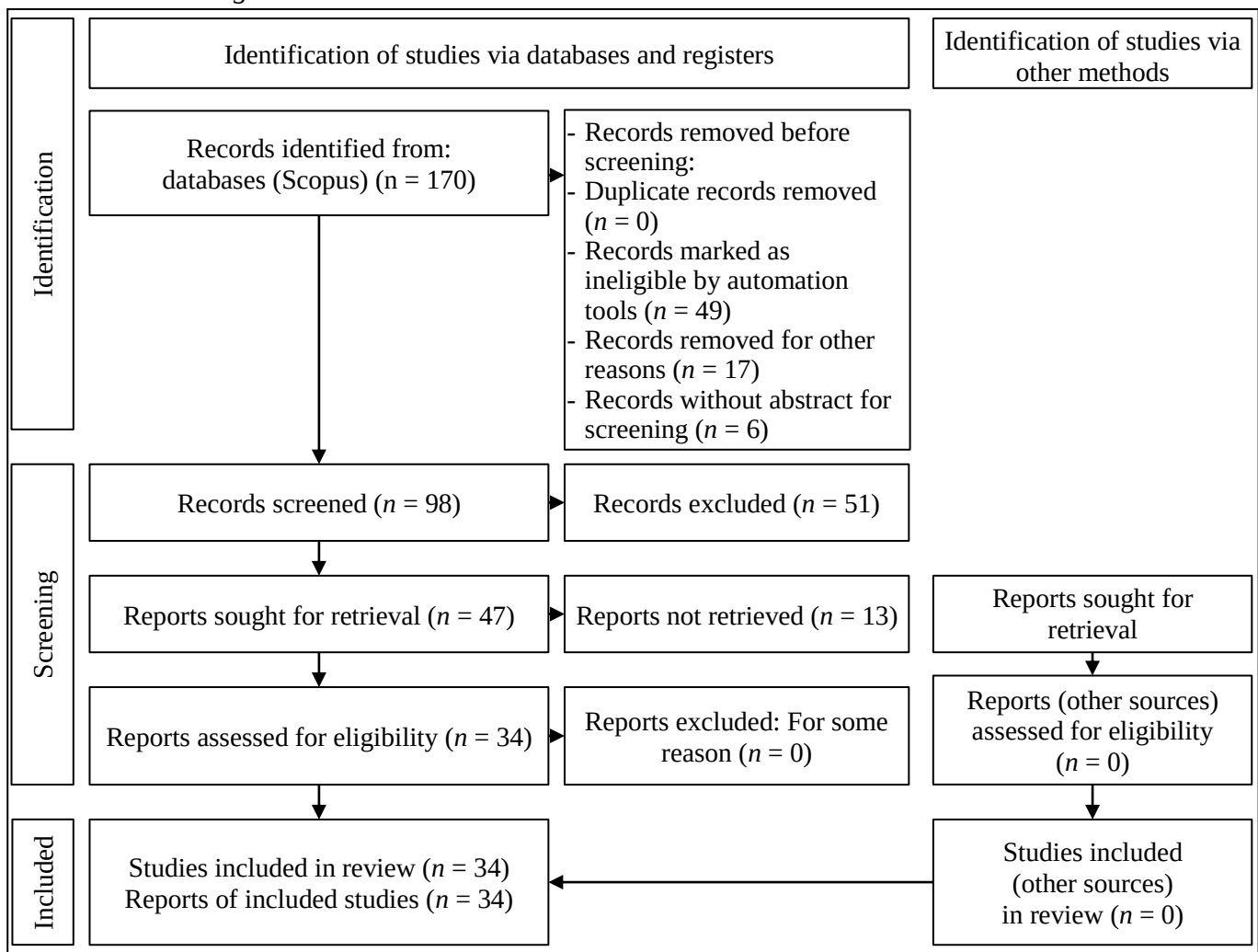
The literature search exclusively used the Scopus database. The search conducted in August 2025 covered publications from 2015 to 2025 and employed the keyword “medical tourist” to specifically capture studies focused on individuals traveling for medical purposes, explicitly distinguishing this population from general health or wellness tourism contexts. Synonyms such as “medical tourism,” “health tourism,” and “cross-border healthcare” were tested in pilot searches using Boolean operators (e.g., “medical tourism” OR “health tourism” OR “cross-border healthcare”); however, these terms returned substantially broader and less focused result sets that frequently fell outside the behavioral inclusion criteria of this review. Figure 1 presents a PRISMA flow diagram illustrating the systematic selection process.

Search Outcomes

The initial search yielded 170 articles. Following the removal of duplicates and the application of eligibility criteria through title, abstract, and full-text screening, 34 articles were retained for final synthesis. The complete selection process is illustrated in the PRISMA flow diagram in Figure 1.

Figure 1

PRISMA Flow Diagram



Eligibility Criteria and Study Selection

Inclusion Criteria

Studies were included if they met the following criteria: (1) appeared in peer-reviewed journals indexed in Scopus; (2) presented empirical research on medical tourist behavior using quantitative, qualitative, or mixed-methods approaches; (3) examined factors influencing decisions, service quality, satisfaction, or behavioral intentions related to medical tourism; (4) were available in full text for comprehensive assessment; and (5) published in English.

Exclusion Criteria

The exclusion criteria were as follows: (1) publication outside the 2015–2025 timeframe; (2) non-peer-reviewed sources; (3) absent abstracts preventing preliminary relevance assessment; (4) exclusive focus on policy, economics, or ethics without behavioral components; and (5) studies addressing domestic medical travel. For the purposes of this review, medical tourists refer to individuals who travel across international borders specifically to receive medical treatment, excluding expatriates, incidental medical care recipients, and domestic medical travelers. Screening was conducted by a single reviewer, with all decisions systematically documented to ensure transparency and consistency throughout the selection process.

Data Extraction

To enhance methodological transparency and ensure replicability, this review employed the Wata Uake system (Wahyudi, 2024), a PRISMA 2020-based tool that structured the review workflow into six stages: keyword and criteria identification, article screening, exclusion verification, title and abstract reading, data extraction, and network analysis with visualization. This workflow enabled the consistent documentation of screening decisions and ensured transparency throughout the article selection process.

The data extraction procedure functioned as the primary analytical instrument used to capture key information from each eligible study, including the study context, theoretical frameworks, behavioral constructs examined, methodological approaches, and principal findings. Each study was evaluated for methodological clarity, theoretical contribution, and relevance to the research questions guiding this review. Data extraction was conducted by a single reviewer. To minimize subjectivity, all extraction decisions were systematically documented and verified against the original sources for internal consistency.

Quality Appraisal

This review conducted a quality appraisal to evaluate the methodological rigor of the included studies. As no single standardized tool was deemed fully appropriate given the diversity of quantitative methodologies across the reviewed studies, which included PLS-SEM, covariance-based SEM, and survey-based approaches with varying levels of reporting completeness, this review applied adapted appraisal criteria developed specifically for this work. The appraisal criteria covered six dimensions: (a) clarity of research objectives; (b) suitability of research design; (c) adequacy of sampling and sample size justification; (d) validity and reliability of measurement instruments; (e) appropriateness of statistical analyses; and (f) coherence between the findings and conclusions. Rather than applying a formal numerical scoring system, this review adopted a narrative synthesis approach to assess the methodological strengths and limitations of the included studies. Studies were not excluded based on quality differences; instead, variations in methodological rigor were considered when interpreting the strength and consistency of the evidence during the synthesis.

Based on these criteria, the included studies were classified into three levels of methodological rigor. Studies rated as high (9 studies, 26%) met five or six of the appraisal dimensions with clear and sufficient reporting. Studies rated as moderate (18 studies, 53%) met three or four dimensions, with partial or inconsistent reporting in the remaining areas. Studies rated as limited (7 studies, 21%) met two or fewer

dimensions, with notable gaps in methodological transparency or justification. Studies demonstrating higher methodological rigor received greater interpretive emphasis during synthesis, whereas studies with limited rigor were considered more cautiously when evaluating the overall pattern of the evidence. This appraisal process informed a broader research agenda, emphasizing the need for longitudinal designs and cross-country generalizability in future medical tourism research.

Data Analysis and Synthesis

Following the quality assessment, this review employed a narrative synthesis approach incorporating descriptive content analysis organized around three research objectives. First, theoretical frameworks were catalogued, and their application contexts were examined. Second, empirical findings regarding antecedents, mediators, and outcomes were extracted systematically. Third, methodological characteristics were analyzed to identify patterns, limitations, and opportunities for future research directions. This structured synthesis enabled the comprehensive integration of theoretical, empirical, and methodological insights from the included studies.

Results

Based on the synthesis of the 34 reviewed articles, the results are organized to address each research question (RQ) in sequence. The section begins with a descriptive overview of the included studies, followed by three subsections that systematically respond to RQ1, RQ2, and RQ3, respectively. The first subsection (RQ1) identifies the dominant theoretical frameworks and examines how they interact. The second subsection (RQ2) traces how safety perceptions, service quality, and trust shape behavioral intentions through antecedents, mediating mechanisms, and behavioral outcomes. The third subsection (RQ3) characterizes the methodological patterns of the field and identifies gaps that warrant future investigation. A narrative synthesis incorporating descriptive content analysis was used to organize and interpret the empirical patterns across the reviewed studies.

Characteristics of Included Studies

The 34 included studies demonstrated a strong geographical concentration in Asian contexts (70.6%), with Southeast Asia (35.3%) and East Asia (20.6%) as the dominant research settings. Methodologically, PLS-SEM emerged as the dominant analytical approach (41%), followed by covariance-based SEM (29%), with sample sizes ranging from 161 to 810 participants. The distribution of the included studies by journal tier showed that 17 articles (50%) were from Q1 journals, 10 (29%) from Q2 journals, 5 (15%) from Q3 journals, and 2 (6%) from Q4 journals. Table 1 presents the complete geographic distribution and methodological characteristics of the included studies in this review. These descriptive characteristics provide the empirical basis for addressing RQ1 and RQ3 in the subsections.

Addressing RQ1: Theoretical Frameworks and Their Interactions

Five theoretical frameworks were identified across the 34 reviewed studies, each offering a distinct but partially overlapping explanatory lens for cross-border healthcare decision making. First, the theory of planned behavior (TPB) was the most frequently used; reviewed studies found weak relationships between perceived risk and attitude (Liang et al., 2019) and limited predictive power of subjective norms (Jiang et al., 2024; Meng et al., 2023). Second, protection motivation theory (PMT) addresses this gap by separating threat appraisal from coping appraisal, with coping mechanisms showing higher predictive power than threat perceptions (Seow et al., 2022). Third, self-determination theory (SDT) foregrounds autonomy, competence, and relatedness as motivational drivers, with cosmopolitanism as the key intrinsic driver (Dash, 2025a) and country image moderating the motivation-to-intention pathway (Dash, 2025b). Fourth, trust theory explains how cognitive and affective trust shape behavioral intention, with cognitive trust most consistently predicting revisit intention (Dash, 2025b) across destination-, institution-, and provider-level assessments (Abdul-Rahman et al., 2023; Cham et al., 2021; Heydari Fard et al., 2021; Malik, 2021). Fifth,

service quality measurement frameworks, including SERVQUAL and HEALTHQUAL, function as evaluative tools for assessing healthcare quality dimensions across the reviewed studies, with relational dimensions such as empathy and responsiveness frequently emerging as stronger predictors of patient satisfaction than tangible attributes such as physical facilities and equipment (Lee et al., 2020; Mahmud et al., 2021; Rosenbusch et al., 2018). The remaining studies drew on less frequently applied or combined frameworks, including push–pull theory, UTAUT2, the health belief model, justice theory, self-efficacy theory, and cognitive dissonance theory, often combined with one of the four dominant behavioral theories above.

Table 1
Geographic Distribution and Methodological Characteristics

Geographic region	Number of studies	Percentage	Primary countries	Sample size range	Dominant analytical approaches	Key research topics
Asia	24	70.6%				
Southeast Asia	12	35.3%	Malaysia (6), Thailand (3), Singapore (3)	161–647	PLS-SEM (8), SEM (4)	Service quality, Muslim tourists, destination image
East Asia	7	20.6%	China (4), South Korea (2), Taiwan (1)	224–500	SEM (5), Survey (2)	Cosmetic tourism, behavioral intention, digital adoption
South Asia	5	14.7%	India (3), Bangladesh (2)	288–439	PLS-SEM (3), Mixed methods (2)	Country image, outbound tourism, justice perceptions
Middle East	6	17.6%	Iran (3), Turkey (2), Egypt (1)	161–500	PLS-SEM (3), SEM (2), Survey (1)	Trust building, cultural factors, post-COVID adaptation
Europe	2	5.9%	Portugal (1), Spain (1)	332–810	SEM (2)	Servicescape, spa tourism
Multi-country	2	5.9%	Various combinations	501–647	Mixed methods	UTAUT2, Technology adoption, global patterns
Total	34	100%	15 countries	161–810	PLS-SEM (14), SEM (10), Other (10)	

Beyond identifying the dominant frameworks, RQ1 also asks how these frameworks interact. The reviewed studies show three points of integration. First, TPB and PMT integrate at the boundary between cost–attitude logic and threat–coping logic, where TPB-based studies report weak risk–attitude links (Liang et al., 2019), and PMT-based studies fill this gap by showing that coping appraisal predicts intention more strongly than threat appraisal alone (Seow et al., 2022). Second, SDT and service quality models integrate at the competence dimension, where SDT’s emphasis on competence as an intrinsic motivator aligns with the verifiable expertise that drives cognitive trust in service quality models (Cham et al., 2021; Rosenbusch et al., 2018). Third, all five frameworks converge on safety, trust, and waiting time as recurrent constructs, although their operationalization varies. Safety expectancy was measured using UTAUT2 adapted items in Shareef et al. (2024) without a standardized scale; waiting time sensitivity was operationalized as a structural barrier (Shareef et al., 2024), a justice perception (Nabi et al., 2023), and implicitly as a push factor (Rahman et al., 2022); and cognitive versus affective trust was most rigorously differentiated by Dash (2025a), who found that only cognitive trust dimensions significantly predicted revisit intention. These three points of integration indicate that the dominant frameworks are partially complementary rather than mutually exclusive, providing the empirical basis for the integrated framework proposed in the Discussion (Figure 2).

Addressing RQ2: How Safety, Service Quality, and Trust Shape Behavioral Intentions

To address RQ2, this section traces how the three core constructs identified in the research question, safety perceptions, service quality, and trust, shape medical tourism behavioral intentions. The findings are organized along the antecedent, mediating mechanism, and behavioral outcome pathway, beginning with antecedents below, continuing through mediating mechanisms (service quality and trust), and ending with behavioral outcomes (revisit intentions and word-of-mouth). This pathway-based organization reflects the dominant causal logic observed across the reviewed studies and links the three constructs into a single behavioral chain.

Antecedents: Safety Perceptions, Waiting Time, and Cost

The first segment of the RQ2 pathway concerns antecedents. Across the reviewed studies, safety expectancy was most frequently cited as a leading predictor of medical tourism intention, followed by consideration of waiting time. Cost considerations, while present, ranked lower, suggesting that medical tourism may reflect a coping response to healthcare system failures rather than being purely price-driven. This pattern should be interpreted as a narrative synthesis finding based on the frequency and directionality of the reported relationships rather than pooled effect comparisons. Table 2 presents selected studies illustrating the key factors influencing medical tourism intentions across the reviewed literature.

Table 2

Selected Studies Illustrating Key Factors Influencing Medical Tourism Intentions

Author(s)	Country context	Key antecedents	Theoretical lens	Sample size	Main findings
Shareef et al. (2024)	Multi-country	Safety expectancy, waiting time, social influence, price-value	UTAUT2	647	Safety and waiting time most influential; recreational benefits rarely considered
Dash (2025a)	India	Intrinsic motivation (cosmopolitanism), extrinsic motivation (perceived benefit, affordability)	Self-Determination Theory	302	Cosmopolitanism key driver; country image moderates motivation-intention relationship
Jiang et al. (2025b)	China	Preferential policies, infrastructure, attraction, value for money	Push-pull theory + TPB	439	Policies have greatest impact; geographical distance varies effect
Chelliah et al. (2021)	Iran (Middle East visitors)	Travel motivation, perceived risks, travel constraints	TPB framework	161	Motivation overcomes perceived risks; destination image strongest predictor
Sag & Zengul (2019)	Turkey	Experience, technology, flight distance, religious similarity, price	Market segmentation	288	Regional differences significant; geographical residence influences behavior
Liang et al. (2019)	China (cosmetic)	Perceived benefit, perceived risk, attitude, subjective norm	Extended MEDTOUR + TPB	500	Weak relation between risk and attitude; behavioral control-intention link weak
Seow et al. (2022)	Malaysia	Health threats, coping alternatives, protection motivation	Protection Motivation Theory	501	Higher predictive power for coping than threats; risk adaptive behavior valuable
Balouchi & Aziz (2024)	General	Self-efficacy sources (mastery, vicarious, emotional, social)	Self-efficacy theory	224	All sources except social persuasion significant for social media use

Service Quality Dimensions and Patient Satisfaction

The first mediating segment of the RQ2 pathway concerns service quality, examining how interpersonal and relational dimensions of care shape patient satisfaction as a precursor to behavioral

intentions. Doctor interaction quality emerged as the strongest service quality predictor across the reviewed studies, underscoring the irreplaceable human core of healthcare despite digital transformation. Most notably, Rosenbusch et al. (2018) found that doctor interaction quality yielded the highest standardized coefficient in a patient satisfaction model, offered here as an illustrative finding rather than a generalizable estimate. Accessibility and interpersonal manner were identified as critical predictors by Rahman (2019), with accessibility showing a notably strong direct effect on perceived service quality, consistent with the broader pattern observed across the reviewed studies. Mahmud et al. (2021) applied the HEALTHQUAL model and found that empathy, tangibility, efficiency, and safety collectively predicted satisfaction and loyalty. Khodayari-Zarnaq et al. (2021) identified significant expectation-perception gaps in clinical quality and administrative dimensions, finding that quality gaps contributed to declining revisit intentions. Studies examining perceived value as a mediating construct further demonstrated that experiential quality drives satisfaction through perceived value and trust (Loureiro, 2017; Prajitmutita et al., 2016; Wu et al., 2016), whereas cost- and quality-oriented innovation emerged as a complementary pathway to patient satisfaction in hospital settings (Ghasemi et al., 2023). Taken together, these findings suggest that service quality in medical tourism operates through a relational hierarchy, with interpersonal dimensions, particularly doctor interaction, functioning as the primary pathway to patient satisfaction, whereas tangible and administrative dimensions serve as supporting conditions.

Trust and Destination Image

The second segment of the RQ2 pathway concerns mediating mechanisms, specifically how trust and destination image translate antecedent safety perceptions into behavioral intentions. Post-pandemic studies suggest a shift toward cognitive trust dimensions that more consistently predict revisit intentions than affective trust, as documented by Dash (2025b). However, this pattern should be interpreted cautiously, given the limited number of post-pandemic studies and their concentration in Asian contexts. Destination image components, including country reputation, healthcare facility image, and safety perceptions, significantly mediated the relationship between service quality and behavioral intentions in the reviewed studies. Cham et al. (2021) found that country knowledge, safety, and accessibility shaped brand trust and revisit intention among Chinese medical tourists in Malaysia. Heydari Fard et al. (2021) identified perceived authenticity and medical center trust as key drivers of word-of-mouth in Iranian contexts. Clinical trust and patient well-being jointly predicted post-COVID revisit intentions in Egypt (Abdul-Rahman et al., 2023), and national brand authenticity combined with healthcare provider trust drove advocacy behavior in India (Malik, 2021). Collectively, these findings suggest that trust formation in medical tourism is a multi-layered process, beginning with a macro-level destination image evaluation and progressively narrowing to institution- and provider-level trust assessments that ultimately shape revisit and advocacy intentions.

Behavioral Outcomes and Revisit Intentions

The third and final segment of the RQ2 pathway concerns behavioral outcomes, tracing how trust-mediated satisfaction ultimately drives revisit intentions and word-of-mouth recommendations. Patient satisfaction strongly predicted revisit intentions and word-of-mouth recommendations across the reviewed studies, with both cognitive and affective trust mechanisms mediating these relationships. Rahman et al. (2022) found that post-visit destination image, encompassing infrastructure, attraction, value, and enjoyment, significantly predicted revisit intentions, with stronger effects observed among tourists with longer stays and larger travel groups. Perceived medical quality and physiologist trust jointly predicted revisit intentions in China, with cultural distance moderating these pathways (Fengmin et al., 2022). Cognitive dissonance emerged as a distinct behavioral mechanism in Majeed et al. (2024), where health conditions shaped destination choice through post-choice pre-outcome regret, negatively impacting the intention to visit. Justice perceptions, procedural, informational, and interpersonal, drove outbound medical tourism intention negatively among dissatisfied Bangladeshi patients with domestic healthcare (Nabi et al., 2023). In the context of European spas, performance expectancy emerged as the dominant predictor of purchase intention across both wellness and healthcare/medical tourist segments, reinforcing the functional nature of healthcare-motivated travel over hedonic aspects (Pelegrín-Borondo et al., 2020).

Addressing RQ3: Methodological Patterns and Research Gaps

Methodological pattern analysis revealed limited methodological diversity that may constrain generalizability: 82% of the included studies employed cross-sectional designs, no longitudinal studies were identified, and only two multi-context comparisons were found. The predominance of PLS-SEM (14 studies, 41%) reflects researchers' preference for a method capable of capturing multipath relationships among latent behavioral constructs in moderate-sample settings. However, only eight studies (24%) explicitly justified their analytical technique selection. Cross-contextual assessment further showed that only seven studies (21%) acknowledged boundary conditions or tested contextual moderators, thereby limiting their broader applicability. Beyond analytical technique justification, five additional methodological gaps were identified: only six PLS-SEM studies (43%) reported a complete model evaluation (outer model, inner model, and Q^2); only 11 studies (32%) discussed non-significant findings; only four studies (12%) considered alternative explanations; and only nine studies (26%) provided a substantive discussion of limitations.

Discussion and Conclusion

Discussion of Main Results

Addressing RQ1: Theoretical Frameworks and Their Interactions

This section addresses RQ1 by examining how the dominant theoretical frameworks interact and where their explanatory boundaries lie. The reviewed literature reveals that no single theoretical framework fully captures the complexity of medical tourism decision making. TPB appeared most frequently; however, its application warrants critical evaluation. Attitudes toward a destination in medical tourism contexts are shaped by risk tolerance and safety expectations rather than mere desirability, while perceived behavioral control reflects access constraints and healthcare literacy rather than general travel competence. The consistently weak relationships between perceived risk and attitude (Liang et al., 2019) and the limited predictive power of subjective norms (Jiang et al., 2024; Meng et al., 2023) suggest that TPB's cost-attitude logic does not fully capture the threat-regulation processes central to healthcare decisions.

PMT addresses this limitation by separating threat appraisal from coping appraisal, with coping mechanisms demonstrating a higher predictive power than threat perceptions alone (Seow et al., 2022). These findings position medical tourism decisions closer to risk regulation behaviors than conventional consumer choices. SDT complements this perspective by foregrounding intrinsic motivational drivers, particularly cosmopolitanism, alongside extrinsic factors, with country image moderating the motivation-to-intention pathway (Dash, 2025a, 2025b). Service quality models bridge the antecedent and mediating layers of the framework, consistently demonstrating that relational dimensions outweigh tangible attributes in shaping patient satisfaction (Mahmud et al., 2021; Rahman, 2019; Rosenbusch et al., 2018; Zailani et al., 2016).

The most substantive theoretical tension exists between TPB's cost-attitude logic and PMT's coping appraisal perspective, empirically reflected in the relative prominence of safety and waiting time over cost across the reviewed studies. SDT's competence dimension of SDT aligns with the emphasis on verifiable expertise in cognitive trust, whereas service quality models connect antecedent evaluation to mediating mechanisms. Three theoretical gaps warrant explicit attention in this study. First, medical tourism decisions may function more as risk regulation behaviors than as conventional consumer choices, as evidenced by coping appraisal dominance in Seow et al. (2022) and cognitive dissonance in Majeed et al. (2024). Second, decision-making appears to be sequential rather than singular, with Cham et al. (2021) demonstrating that pre-encounter brand trust shapes post-treatment satisfaction and behavioral intention. Third, treatment urgency moderates theoretical applicability: cost and push-pull dynamics dominated elective procedures (Jiang et al., 2024; Liang et al., 2019), whereas safety and coping mechanisms were more prominent in serious health conditions (Majeed et al., 2024; Seow et al., 2022). Future research would benefit from incorporating signalling theory and institutional trust theory to explain how destination credibility is communicated across cultural contexts.

Addressing RQ2: Antecedents, Mediating Mechanisms, and Behavioral Outcomes

This section addresses RQ2 by tracing how antecedents, mediating mechanisms, and behavioral outcomes interconnect across the reviewed studies. The synthesis of 34 empirical studies reveals that medical tourism decisions are driven by a complex interplay of antecedents, mediating mechanisms, and behavioral outcomes that extend well beyond economic considerations, as illustrated in the integrated framework in Figure 2. The relative prominence of safety expectancy and waiting time over cost considerations indicates that PMT's coping appraisal perspective may offer greater explanatory power than TPB's cost-attitude logic alone, consistent with the health belief model's emphasis on perceived barriers and benefits and prospect theory's loss aversion principle in high-stakes decision-making. Clinical reputation and physician expertise appeared to outweigh cost savings in destination selection, with cultural similarity ranking higher than price (Yıldız & Khan, 2019). These findings indicate a potential reframing of medical tourism from economic arbitrage to a safety- and trust-driven coping response, although this interpretation remains bounded by the narrative synthesis design, regional concentration in Asian contexts, and the absence of pooled quantitative modeling or longitudinal validation.

In mediating mechanisms, the prominence of doctor interaction quality, as most notably demonstrated by Rosenbusch et al. (2018), suggests that the relational dimensions of care may outweigh tangible facility attributes in shaping patient satisfaction. This pathway reflects a cognitive appraisal process that evaluates provider competence and responsiveness, which subsequently activates affective responses that drive behavioral outcomes, including revisit intentions and word-of-mouth. Cognitive trust, based on verifiable expertise and performance, appears to precede and reinforce affective trust, with post-pandemic evidence suggesting that cognitive trust dimensions appear to have become increasingly salient motivational anchors in destination selection (Dash, 2025b); however, cross-cultural and longitudinal verifications are needed.

Several constructs require theoretical differentiation within this mediation layer. Safety expectancy is a prospective pre-treatment judgment closer to PMT's coping appraisal, whereas clinical trust develops through direct service interactions (Abdul-Rahman et al., 2023). Similarly, perceived value integrates functional, emotional, and social dimensions, whereas cost-benefit evaluation is narrowly economic in nature. Destination image operates at a macro-national level (Cham et al., 2021), whereas hospital reputation is institution-level and grounded in clinical performance (Nakhaeinejad et al., 2022). These distinctions are essential for developing precise measurement protocols in future studies.

Addressing RQ3: Methodological Patterns and Research Gaps

This section addresses RQ3 by identifying the methodological patterns that characterize the field and the gaps that warrant future investigation. The methodological landscape of medical tourism research exhibits systematic homogeneity, which constrains theoretical advancement. The predominance of cross-sectional PLS-SEM designs (82% cross-sectional; 41% PLS-SEM) limits causal inference and understanding of how behavioral intentions evolve over time. Only eight studies (24%) explicitly justified their analytical technique selection, and only six PLS-SEM studies (43%) reported complete model evaluation, including outer model, inner model, and Q^2 . Furthermore, only 11 studies (32%) discussed nonsignificant findings, only four (12%) considered alternative explanations, and only nine (26%) provided substantive limitation discussions. These gaps suggest that the field would benefit from greater methodological transparency and diversity.

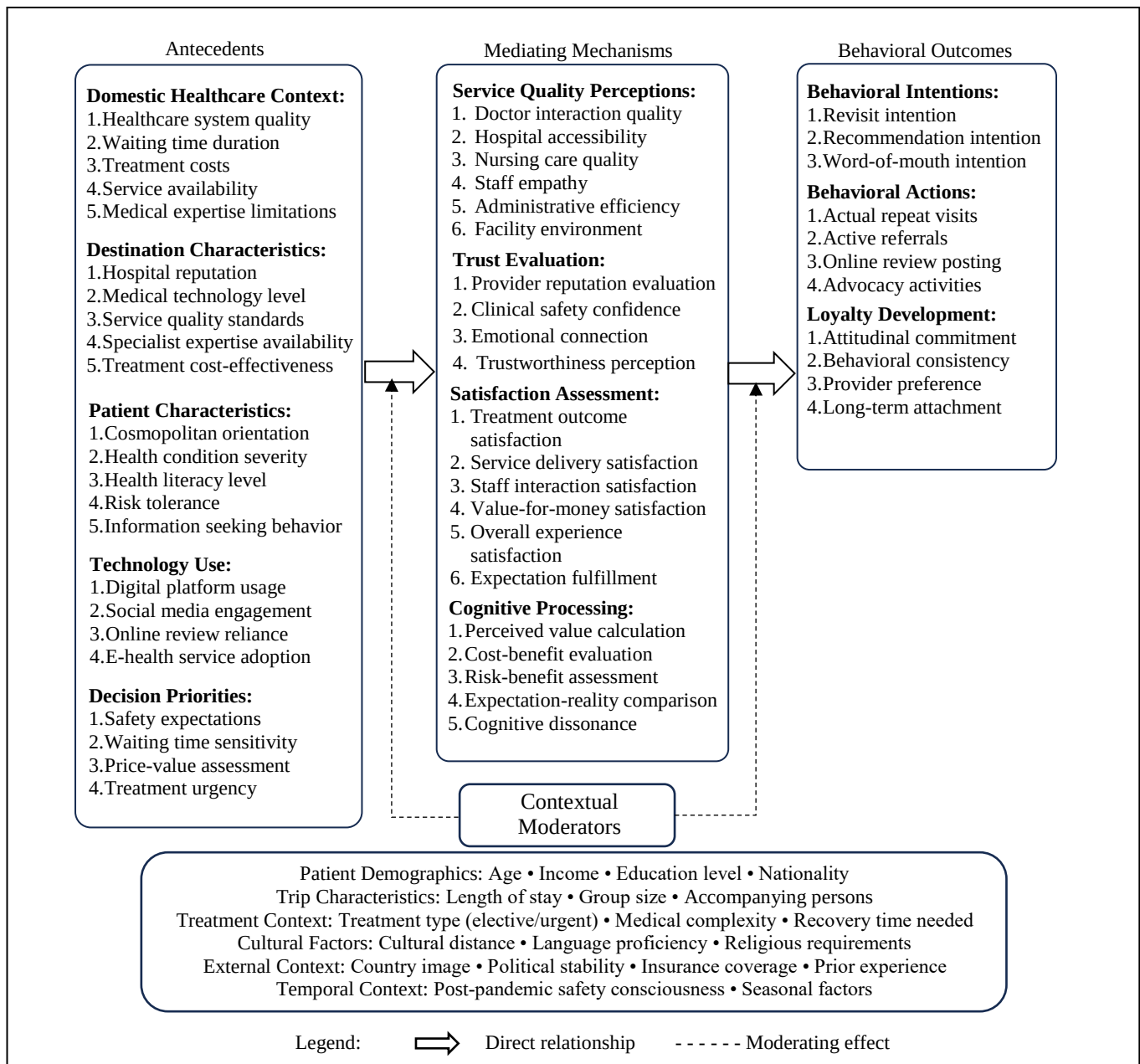
The geographic concentration in Asian contexts (70.6%) further limits the generalizability of existing findings across different healthcare system maturity levels, regulatory environments and cultural contexts. Only seven studies (21%) acknowledged boundary conditions or tested contextual moderators, which represents a significant constraint on theoretical applicability. Future research should prioritize longitudinal designs to examine how trust mechanisms evolve across the patient journey, comparative studies in underrepresented regions, including Africa, Latin America, and Eastern Europe, and experimental designs to test the moderating effects of cultural dimensions on service quality-behavioral outcome relationships.

Theoretical Integration and Framework Synthesis

From a behavioral science perspective, this review contributes to the literature by mapping how cognitive appraisal, motivational processes, and relational trust mechanisms jointly shape cross-border healthcare decisions, advancing theoretical understanding beyond single-framework accounts. The integration of TPB, PMT, SDT, and trust theory suggests that medical tourism decisions may be better characterized as risk-regulation behaviors than as conventional consumer choices. The integrated framework (Figure 2) synthesizes these theoretical streams into a unified behavioral pathway: antecedent factors, including safety expectancy, waiting time, and destination image, activate cognitive appraisal processes that are mediated by service quality evaluations and trust formation, ultimately driving behavioral outcomes, including revisit intentions and word-of-mouth recommendations.

Figure 2

Integrated Framework of Medical Tourism Behavior



However, these theoretical contributions must be interpreted within the methodological boundaries of narrative synthesis: the findings reflect directional patterns across heterogeneous studies rather than

statistically consolidated causal claims, and generalizability remains constrained by geographic concentration in Asian contexts, the predominance of cross-sectional PLS-SEM designs, and the absence of longitudinal validation.

Limitations

This review has some limitations. First, exclusive reliance on Scopus and the use of a single search keyword (“medical tourist”) may have excluded relevant studies indexed under related terms such as “health tourism” or “cross-border healthcare.” Future reviews should employ multi-database and multi-keyword strategies to improve their coverage. Notably, although the search timeframe was extended to 2025, no studies published in 2025 met the eligibility criteria at the screening stage, which may reflect publication lag rather than an absence of recent scholarship. Second, the geographic concentration in Asian contexts (70%) limits the generalizability of the findings to other regions and healthcare system contexts. Third, the predominance of cross-sectional designs (82%) constrains causal inference and limits understanding of how behavioral intentions evolve over time. Fourth, the narrative synthesis approach, while appropriate for integrative reviews, does not permit pooled effect size estimation or causal inference beyond what individual studies report. Fifth, the search was conducted in August 2025, and studies published after this date were not included in the review. Sixth, although data extraction was conducted by a single reviewer, methodological transparency was maintained through systematic documentation of all extraction decisions and verification against original sources using the Watase Uake structured workflow (Wahyudi, 2024). Future reviews should consider dual-reviewer processes to further strengthen interrater reliability.

Implications for Behavioral Science

This review contributes to behavioral science by synthesizing findings from 34 empirical studies into an integrated framework that maps the relationships among antecedents, mediating mechanisms, and behavioral outcomes in the context of medical tourism. While prior research has often examined isolated theoretical perspectives (Cham et al., 2021; Nakhaeinejad et al., 2022), the integrated framework (Figure 2) offers a comprehensive roadmap for investigating full behavioral pathways. Specifically, it enables a systematic examination of how healthcare context factors, destination attributes, and patient characteristics interact through mechanisms such as service quality, trust, and satisfaction to shape behavioral outcomes.

The finding that safety and waiting time appear to outweigh costs challenges rational choice assumptions, suggesting that emotional and cognitive factors dominate economic considerations in healthcare decision making (Seow et al., 2022; Shareef et al., 2024). Future research should address these three critical gaps. First, longitudinal studies are needed to examine how trust mechanisms evolve across the patient journey from pre-departure decision-making to post-treatment evaluation, testing whether cognitive trust maintains dominance or reverts to affective dimensions over time (Dash, 2025b). Second, comparative studies in underrepresented regions, such as Africa, Latin America, and Eastern Europe, should investigate whether the safety-over-cost hierarchy persists across different healthcare system maturity levels and regulatory environments (Jiang et al., 2024; Yıldız & Khan, 2019). Third, experimental designs could test the moderating effects of cultural dimensions, individualism–collectivism, and uncertainty avoidance on the relationship between service quality dimensions and behavioral outcomes, advancing the theoretical understanding of cross-cultural medical tourism behavior (Fengmin et al., 2022; Sag & Zengul, 2019).

These findings have significant practical implications for the stakeholders. Healthcare providers should shift from price-competitive to safety-centered positioning by prioritizing transparent clinical outcome reporting, reducing wait times through operational optimization, and investing in physician communication training, given the frequently observed prominence of doctor interaction quality in shaping patient satisfaction across the reviewed studies (Lee et al., 2020; Mahmud et al., 2021; Rahman, 2019; Rosenbusch et al., 2018). Destination marketing organizations must emphasize verifiable safety credentials and evidence-based quality metrics through digital platforms, showcasing physician expertise and patient

testimonials to build cognitive trust rather than promoting cost savings (Cham et al., 2022; Heydari Fard et al., 2021). Policymakers should standardize international healthcare accreditation systems, implement mandatory patient outcome reporting, and develop fast-track visa processes to address waiting time concerns, which rank second only to safety in decision making (Nabi et al., 2023; Shareef et al., 2024).

Conclusion

This systematic literature review advances medical tourism scholarship by synthesizing a decade of research (2015–2025) into an integrated behavioral framework that addresses critical theoretical fragmentation and methodological limitations. Four key contributions emerge: (1) the integration of five dominant theoretical streams (TPB, PMT, SDT, trust theory, and service quality models) drawn from 34 empirical studies into a unified behavioral framework; (2) narrative synthesis patterns suggesting the relative prominence of safety and trust over cost, indicating that medical tourism may reflect coping responses to healthcare system failures rather than purely economic arbitrage, although this interpretation is bounded by the narrative synthesis design; (3) quantification of methodological homogeneity to establish research diversification agendas; and (4) documentation of post-pandemic trust shifts, specifically the relative rise of cognitive over affective trust in determining revisit intentions, as an emerging pattern that warrants further longitudinal investigation.

These findings have practical implications for multiple stakeholders. Healthcare providers should prioritize safety-centered value propositions over price competition by investing in transparent clinical outcome reporting and effective physician communication. Destination marketers should emphasize verifiable quality credentials and cognitive-trust signals through digital platforms. Policymakers should consider harmonizing international accreditation standards and reducing barriers to patient mobility. Future research should prioritize longitudinal designs, cross-cultural comparisons beyond Asian contexts, and experimental approaches to test the causal behavioral pathways proposed in this integrated framework.

Declarations

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