

An Importance–Performance Analysis Approach to a Tourism Destination: the Case of Lisbon Metropolitan Area, Portugal

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Abstract: Pull factors, the attributes of a specific location, matter in tourism. These factors encompass the distinctive characteristics and alluring features that attract tourists to a destination, their importance and performance influencing the decision-making process and overall experience. A clear comprehension of this concept is crucial for destinations' economic vitality as they compete for tourists and strive for economic expansion and employment prospects. Indeed, an in-depth knowledge of these factors' importance and performance underscores the need for regions to adjust their approach to evolving tourist preferences. This adaptation is crucial to fostering responsible and sustainable tourism practices that safeguard cultural and natural resources. However, besides learning about the factors considered critical by tourists to visit a location, it is paramount to analyse how they evaluate the performance of each of these factors while staying there.

This study focuses on the Lisbon Metropolitan Area (LMA), Portugal, and the findings will provide essential insights into destination competitiveness, sustainable tourism development, and the creation of unique travel experiences. As a destination that gained popularity, attracting tourists from all over the world, it is necessary to comprehend the specific factors that contribute to this vibrant region's allure and how it performs regarding them. The research will use the Importance-Performance Analysis to make data interpretation accessible and suggest relevant measures to improve competitiveness based on optimising the allocation of resources among the various factors/attributes analysed. The research incorporates numerous criteria categories, including historical significance, urban appeal, natural scenery, culinary experiences, cultural heritage, and aspects like streets' cleanliness, transport availability, or health emergency infrastructures.

The study's conclusions will impact Lisbon region's (LMA) tourism and destination management. By understanding what factors are more important for tourists that visit the area and their evaluation of the performance of each of these factors, stakeholders can improve marketing, infrastructure, and the visitors' experience to promote sustainable development and maintain Lisbon's standing as a top tourist destination for rewarding and enlightening experiences. Relevant data is also provided to inform future tourism initiatives. This study adds to the academic discussion of location competitiveness and unique travel experiences.

Keywords - Tourism, Destination Pull Factors, Importance Performance Analysis, Destination Competitiveness, Tourist Satisfaction.

1. Introduction

With its increasing economic importance, tourism has gained relevance in academic research (Leask, 2016), with substantial gains in scientific knowledge and decision-making support tools. With the growth of world tourism and the growing rivalry amongst destinations, achieving destination competitiveness is a central feature of tourism policy and academic debate. The knowledge about a destination's competitive position, including its weaker and stronger attributes, is vital to governments and market players (Dwyer, Forsyth and Rao, 2000) since it is critical for its success (Dwyer and Kim, 2003; Mangion, Durbarry and Sinclair, 2005).

Considering the tourist locations' competitiveness research, several methods have been applied (Morgan, Lugosi and Ritchie, 2010; Pearce and Benckendorff, 2006), with the Importance/Performance Analysis (IPA) model (Martilla and James, 1977) being applied to assess the competitiveness of tourism destinations based on tourist feedback. Despite some criticism (Busacca and Arbore, 2011), the model allows a rigorous competitive analysis of a tourist destination widely applied to tourism (Lai and Hitchcock, 2015). The IPA analysis has been used in

tourism, enabling destinations to improve their performance and formulate strategies for enhancing their offer (Bi et al., 2019).

This article presents an application of the IPA model to one of Europe's fastest-growing destinations, the Lisbon region. The research aims to obtain insights about the relevance of the pull factors (attributes) influencing Lisbon region tourism competitiveness and the region's performance on these attributes based on the tourists' feedback. While there is already an IPA study considering the tourists' feedback about Portugal (Padma, 2016), and an IPA study considering the stakeholders (not tourists) feedback about Lisbon city (Rosário et al., 2022), to the best of our knowledge, this is the first research regarding the tourists' perspective on the Lisbon region.

The study of the Lisbon region's competitive attributes will be based on the perspective of winter tourists. This study contributes both to academia and practice. On the one hand, this study reveals the relevance of the tourists' feedback approach to identifying a destination's competitiveness attributes. On the other hand, the study offers Lisbon's region destination managers and other stakeholders' information regarding the pull factors contributing to evaluating and choosing the region as a tourist destination and their respective performance. The results can also help regional tourism market stakeholders make investment allocation decisions.

2. Importance-Performance Analysis in Tourism

The importance-performance analysis (IPA) was developed by Martilla and James (1977) and used in marketing with the first application to the vehicle industry. The IPA model is a business research technique to help managers' decision-making based on the concepts of choice models of multiple attributes. It is intended to assist in investment allocation decision-making and to maintain and improve consumer satisfaction (Martilla and James, 1977). The objective of the IPA model is to make data interpretation accessible and to suggest relevant measures to enhance competitiveness based on the optimisation of the allocation of resources among the various attributes analysed (Abalo, Varela and Manzano, 2007).

In the traditional IPA technique, data from customer satisfaction surveys or service quality surveys (Cronin and Taylor, 1992) are used to construct a two-dimensional matrix, where the x-axis depicts the attribute importance and the y-axis represents the attribute performance (satisfaction or service quality). The mean of performance and importance divide the matrix into four quadrants, identifying areas of high or low attribute performance combined with high or low attribute importance. The matrix provides managers with information on the aspects that (i) are performing well but need continued investment; (ii) aspects that require additional investment as they are underperforming; (iii) aspects that are of low priority and require little investment; and (iv) aspects that are at risk of overinvestment as they are of minor importance to customers (Coghlan, 2012). Azzopardi and Nash (2013) presented the IPA interpretation in tourism research (Figure 1).

Other authors considered additionally using a diagonal line over the IPA matrix with all points above an upward-sloping 45° line where importance exceeds performance, being high priorities for improvement or *market opportunities*. Below this line are presented the *satiated needs*. All attributes over the line have the same importance and performance results and, therefore, the same priority for improvement (Hawes and Rao, 1985). Wu and Jimurathis (2019) combined the diagonal line and quadrant models with the scale-centred axes and crosshairs at 4 out of 5.

While some IPA research uses well-established attributes derived from previous studies (Tonge and Moore, 2007), it is crucial to note that the validity of the study can be seriously compromised if the importance measurement fails to reflect the specific characteristics of the research target (Azzopardi and Nash, 2013). To address this, Lai and Hitchcock (2015) recommend that researchers develop unique attributes tailored to their specific study. As earlier research has shown (Tonge and Moore, 2007), it is crucial to select the correct attributes for the IPA model to make effective management decisions (Oh, 2001).

This research technique has been applied to all kinds of tourism locations covering several subjects of interest, with some of the more recent being about destination competitiveness of six top island destinations in Southeast Asia (Mustafa, Omar and Mukhiar, 2020), performance and customer evaluation of green hotel attributes (Quan, Kim and Han, 2022), local people's view of sustainable tourism principles (Akinci and Öküz, 2022) and the quality gaps in tourism for people with disabilities (Skalskaa, 2023).

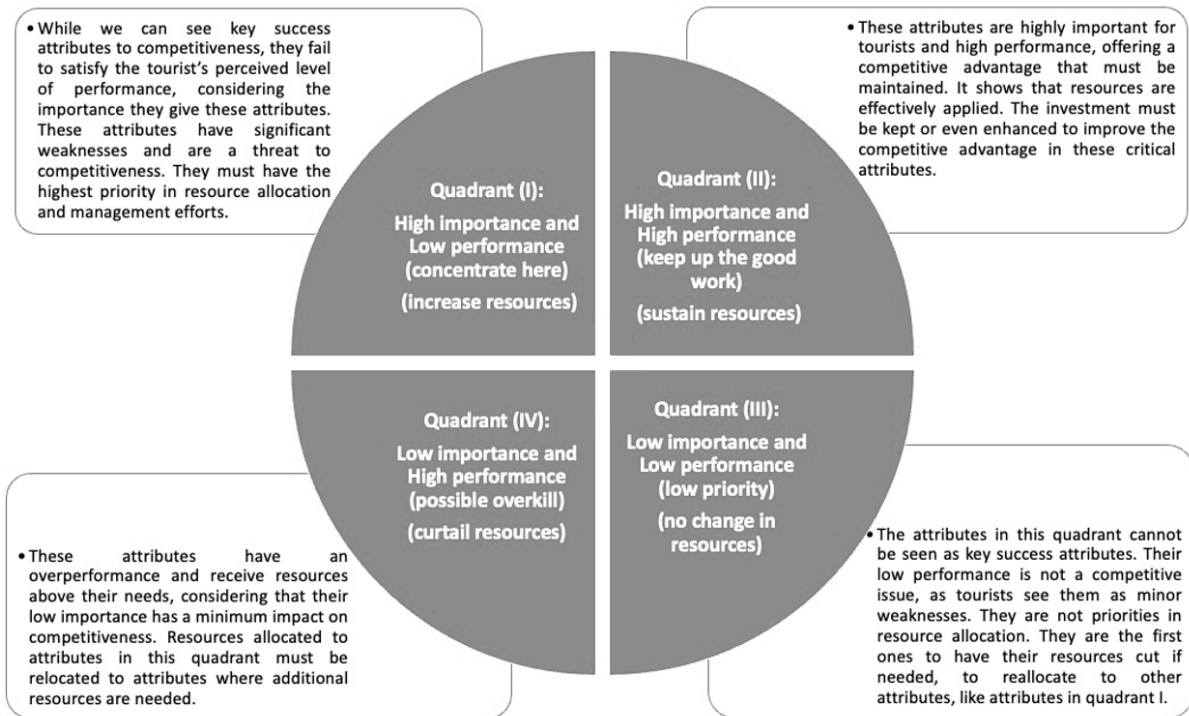


Figure 1: The IPA grid: application to tourism research (Azzopardi and Nash, 2013)

3. The Importance-Performance Analysis Applied to the Lisbon Metropolitan Area

The LMA is centred around the capital city of Lisbon and comprises 18 counties, including the city of Lisbon. In 2021, the population reached 2.869 million (Câmara Municipal de Lisboa, 2022), with 509,614 residents living in the town. With 3015 square km, the region accounts for 3.3% of Portugal's total territory. With an active population of more than 1.4 million individuals (29% of Portugal's active population), the LMA represents 36% of the country's GDP.

While the pull factors might entice travellers to choose a particular destination like LMA, it is equally important to understand how these factors measure up during the tourists' stay. The pull factors performance measures their level of satisfaction. If the reality falls short of their expectations, it can lead to disappointment and negatively impact their experience of the destination. Tourists who have a great experience are more likely to return, encourage others to visit, and become ambassadors for the location (Goo et al., 2022), causing a direct economic impact on the destination (Rita, Brochado and Dimova, 2019). Satisfied tourists are more likely to spend money on the destination, fuelling the local economy and creating job opportunities, while analysing tourists' feedback allows destination management organisations, businesses, and local authorities to make informed strategic decisions about resource allocation, enabling the destination to adapt and improve continually.

Pull factors of a destination can vary across destinations and change over time, influenced by various aspects, including demographic changes, technology, infrastructure, political stability, and evolving consumer preferences (Lee, Chung and Koo, 2023). Using other methods than IPA research has been undertaken to examine the pull factors of the Lisbon region (Correia, Kozak, and Ferradeira, 2013; Sarra and Cappucci, 2015; Pestana, Parreira and Moutinho, 2020). All these studies were done before the pandemic, so conducting a fresh analysis of the factors that currently attract and retain importance for tourists in the Lisbon region is crucial.

4. Method

4.1 Data Collection and Instruments

A comprehensive procedure was applied to ascertain the contemporary and appropriate attributes of the Lisbon region (Lee, Chung and Koo, 2023; Zainuddin, Radzi and Zahari, 2015). The initial phase entailed an exhaustive

review of relevant literature to discern the most current contributions to the field that identify tourist destination attributes (Rita, Brochado and Dimova, 2019). Subsequently, a questionnaire was formulated during the second phase, encompassing all the attributes pinpointed in the literature review. This questionnaire was administered to a convenience sample of tourists who chose the most symbolic characteristic of the Lisbon region. Additionally, the participants could add more attributes to the original list according to their perceptions or previous image of the area (Lai and Hitchcock, 2015; Tonge and Moore, 2007; (Zainuddin et al., 2018). In the third phase, four experts on tourism merged and consolidated the attributes into distinct categories to create a specific set of characteristics of this region as a tourist destination (Chen, Lee and Tsai, 2016; Zainuddin et al., 2018). A reduced list of attributes was a goal since the study's target population were tourists.

The final questionnaire was developed, comprehending a list of ten attributes fitted to the destination of the study. Thirteen sampling points were identified to cover the region as best as possible, and the data was collected in November 2023. An importance-performance analysis model based on a 7-point Likert scale (1-lower importance or performance; 7-higher importance or performance) was applied to assess the competitiveness of the Lisbon region as a tourist destination.

4.2 Sample Profile

The convenience sample comprises 388 observations, providing a comprehensive snapshot of its diverse composition. This characterisation emphasises the predominant features of the sample, highlighting the age group, gender, education, employment, income, and nationality.

The age distribution reflects a broad spectrum, with a more significant percentage falling within the 26 to 35 years bracket, constituting 41% of the sample. Noteworthy is the 18 to 25 years group, comprising 18% of the sample, and the 36 to 45 years group, accounting for 17%. The gender distribution reveals a predominance of women, constituting 62% of the sample. Men represent 37.6%, with a minority identifying as non-binary, two individuals.

A substantial 78.3% of respondents indicated possessing "Tertiary education". A smaller proportion holds a "Degree" (2.3%), while nine individuals have pursued post-graduate studies; the rest fall under secondary or primary education.

Among the respondents, 52% are employed full-time, with 39 working part-time. Entrepreneurs constitute 14.7%, while retirees and full-time students account for 11.3% and 9.8%, respectively. Many respondents (41%) report an annual gross income between 20 000 and 40 000 euros. Those earning less than 20 000 euros or between 40 001 and 50 000 euros represent 20.9% and 24%, respectively. Respondents originate from a diverse range of 45 countries, with Brazil (13.4%), Spain (11.6%), and the USA (11.1%) emerging as the most represented.

4.3 Importance/Performance Analysis method

The method considers the IPA Analysis's four quadrants, scale-centred and data-centred, combined with the diagonal line and gap analysis (difference between performance and importance for each attribute).

5. Results Discussion

5.1 Importance-Performance Analysis

Considering the studied attributes, the Importance median scores range from 4 to 7, with mean scores between 4.15 and 6.64 (Table 1). At the same time, the Performance median scores also vary from 4 to 7 but with higher mean scores between 4.72 and 6.68 (Table 2).

When evaluating the importance of the ten attributes in the Lisbon region, the Wilcoxon test showed that only "Nightlife" and "Events and Festivals" did not have a median higher than four in a statistically significant way. Similarly, the t-test showed that only "Events and Festivals" did not have a mean higher than four on a 7-Likert scale. This result indicates that these attributes were not considered as important as others when choosing a travel destination.

When examining the ten attributes' performance, the Wilcoxon test and the t-test showed that the median and mean scores were higher than four on a 7-Likert scale for all attributes, suggesting that the attributes, besides having good performance evaluation, were important results considering their respective importance scores.

Table 1: Importance Attributes Statistical Results

Attributes	Importance			
	Median	Mean	SD	p-value
CHAH - Culture, History and Architectural Heritage	7	5.92	1.52	< .001
G – Gastronomy	7	6.34	1.19	< .001
SCL - Scenic Views and Landscapes	7	6.22	1.35	< .001
CW - Climate and Weather	7	5.88	1.43	< .001
SS - Safety and Security	7	6.64	0.97	< .001
N – Nightlife	5	4.23	2.18	0.02
LA - Language accessibility (English-speaking locals)	7	6.11	1.29	< .001
HFL - Hospitality and Friendliness of the Locals	6	6.08	1.13	< .001
A – Authenticity	6	5.72	1.47	< .001
EF - Events and Festivals	4	4.15	1.95	0.07

5.1.1 Attributes Importance for Lisbon's Region Attractiveness

Table 1 shows the evaluation of the importance of the considered attributes by the sample of tourists. "Safety and Security" was the attribute carrying the highest Importance score (median of seven) and a mean of 6.64, followed by "Gastronomy" (median of seven) and a mean of 6.34. Other specific attributes also significantly influence their travel decisions: "Language accessibility (English-speaking locals)" (median seven and mean 6.11), "Scenic Views and Landscapes" (median seven and mean 6.22), and "Hospitality and Friendliness of the Locals" (median six and mean 6.08) all have a mean greater than six. "Authenticity," "Climate and Weather" (an attribute beyond the control of authorities and other stakeholders), and "Culture, History, and Architectural Heritage" are attributes with means below six but with values near it and medians respectively of 6, 7 and 7, showing the relevance of these attributes for the visitors.

As shown, "Nightlife" and "Events and Festivals" are the less important attributes in travel choices.

Table 2: Performance Attributes Statistical Results

Attributes	Performance			
	Median	Mean	SD	p-value
CHAH - Culture, History and Architectural Heritage	7	6.63	0.78	< .001
G - Gastronomy	7	6.48	0.85	< .001
SCL - Scenic Views and Landscapes	7	6.68	0.7	< .001
CW - Climate and Weather	7	6.08	1.23	< .001
SS - Safety and Security	6	6.10	0.96	< .001
N – Nightlife	5	5.04	1.18	< .001
LA - Language accessibility (English-speaking locals)	7	6.43	0.84	< .001
HFL - Hospitality and Friendliness of the Locals	6	5.96	1.06	< .001
A – Authenticity	6	5.69	1.11	< .001
EF - Events and Festivals	4	4.72	1.16	< .001

5.1.2 Attributes Performance for Lisbon's Region Attractiveness

The tourist sample provides additional feedback, offering their evaluation of the performance of the attributes in the Lisbon region, considering the importance of these attributes for their travel choices (Table 2).

Although all performance variables have a median and mean higher than four in a statistically significant way (p-values of median Wilcoxon test and mean t-test with p-value lower than 0,01), the attributes with better performance are "Scenic Views and Landscapes", "Culture, History, and Architectural Heritage", "Gastronomy",

"Language accessibility (English-speaking locals)", "Climate and Weather" with a median of seven and a mean of respectively 6.68, 6.63, 6.48, 6.43, and 6.08. "Safe and Security", while having a mean above six (6.1), has a lower median (six).

The worst performing attributes are "Nightlife" and "Events and Festivals" (median of five and four and mean of 5.04 and 4.72). Still, since they also have low importance for this sample of tourists, it is impossible to know if this evaluation is due to less good experiences or low to no experience at all.

5.2 Importance-Performance Analysis Grid

All attributes' importance and performance scores were applied to an IPA grid, considering both scale-centred and data-centred techniques (Bacon, 2003) with the diagonal model line in both grids (Hawes and Rao, 1985).

In the scale-centred analysis (Figure 2), all attributes are in quadrant II ("Keep up the good work") and near the top-right corner, showing the attributes' good performance and comparing with the high importance that tourists gave to many of them. Considering the more demanding diagonal line, it's possible to see that "Safety and Security", "Hospitality and Friendliness of the Locals", and "Authenticity" are attributes that can be improved, being market opportunities, even if they reach high scores around six in the 7-Likert scale. On the other hand, the attributes "Events and Festivals" and "Nightlife" are near the "Possible Overkill" quadrant for the research sample, which does not mean that they are not important for the locals.

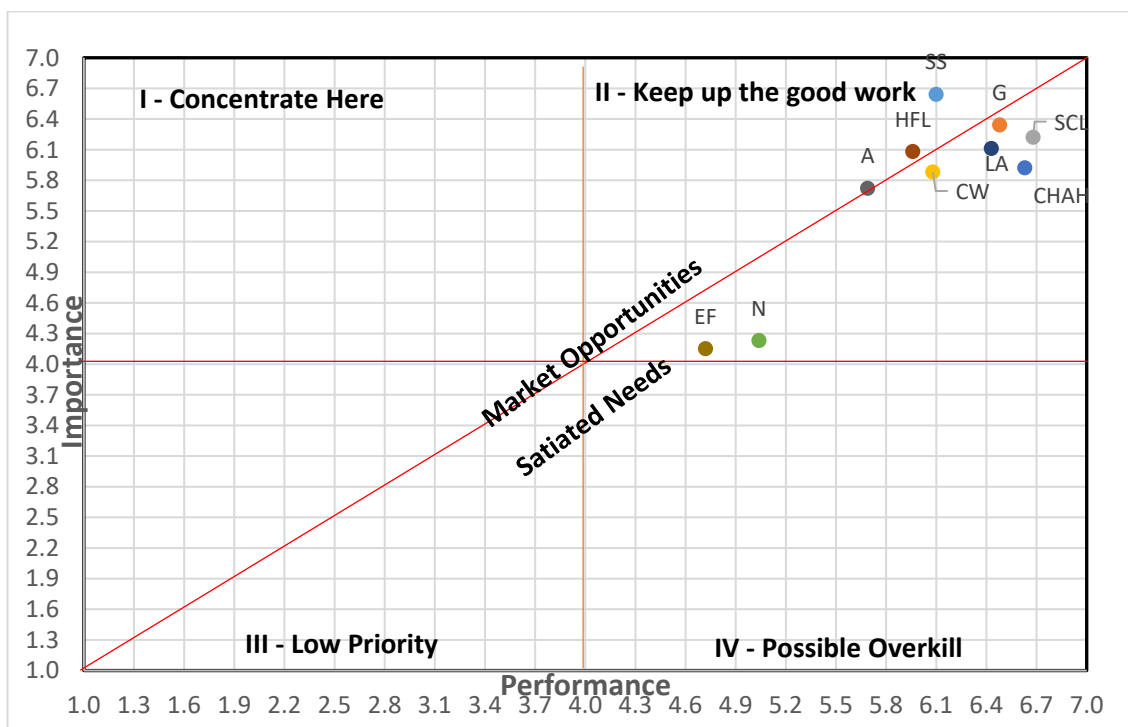


Figure 2: Importance-performance grid – (scale-centred and diagonal line)

For the more demanding data-centred grid of the attributes (Figure 3), the Importance mean is 5.7, and the Performance mean is six, which are considered for the definition of the four quadrants.

In this grid, the "Events and Festivals" and "Nightlife" entered into the III Quadrant of "Low Priority" because the importance given by the tourists is relatively low (median of 4 and 5, mean 4,15 and 4,23 respectively) while attributes "Hospitality and Friendliness of the Locals" and "Authenticity" enter in the quadrant "Concentrate Here" because of their performance below the average performance of attributes, showing the need for measures to try to improve its performance, a difficult task for the responsible stakeholders due to the characteristics of these attributes. The "Safety and Security" has a position in the Keep Up with the Good Work quadrant because it still has a performance evaluation above the attributes' mean, being an attribute of very high importance for the tourist.



Figure 3: Importance-performance grid – (data-centred and diagonal line)

5.3 Gap Analysis

Gap analysis concerns the difference between Performance and Importance means (Bacon, 2003). A negative value shows that the performance of an attribute is lower than the importance given to it, presenting a potential situation to improve their performance, a market opportunity (Table 3).

Table 3: Gap Analysis Statistical Results

Attributes	Gap Analysis		
	Diff. Mean	SD	p-value
CHAH - Culture, History and Architectural Heritage	0.71	1.24	< .001
G – Gastronomy	0.14	1.25	0.02
SCL - Scenic Views and Landscapes	0.45	1.26	< .001
CW - Climate and Weather	0.2	1.52	0.007
SS - Safety and Security	-0.55	1.27	1.00
N – Nightlife	0.81	1.69	< .001
LA - Language accessibility (English-speaking locals)	0.32	1.23	< .001
HFL - Hospitality and Friendliness of the Locals	-0.12	1.41	0.94
A – Authenticity	-0.03	1.49	0.63
EF - Events and Festivals	0.57	1.64	< .001

Considering each of the ten attributes' performance, not all attributes have a statistically significant mean difference higher than zero, meaning their performance is evaluated as lower than their importance for some attributes. "Safety and Security", "Hospitality and Friendliness of the Locals", and "Authenticity" have a statistically significant negative difference of means (p-value higher than 0.05) even if small in dimension, respectively -0.55, -.012, -.003. While these results showed that performance was slightly below the importance that tourist gave them, it is possible to consider their performance evaluation as very positive (mean respectively of 6.10, 5.96, and 5.69).

These findings can be compared to Portugal's seventh position in the Global Peace Index 2023. The negative results regarding "Hospitality and Friendliness of the Locals" and "Authenticity" may be influenced by the changing demographics in the main touristic cities or the closure of traditional shops favouring larger multinational chains or generic souvenir stores in downtown areas. These factors could potentially contribute to the observed results.

6. Conclusions

In a post-pandemic world, the importance of exploring touristic destinations and assessing their performance has taken on new significance. The pull factors of cultural richness, natural beauty, culinary delights, warm hospitality, and vibrant art scenes remain as appealing as ever. Still, travelers seek familiar attractions and experiences and value destinations that have adapted to the changing circumstances, ensuring their safety and enjoyment. As the world reopens to tourism, tourists discover that their favorite destinations, enriched by the pandemic's lessons, are ready to be explored once more and have been evaluating their performance with new eyes.

This research aims to assess the tourism attractiveness of the Lisbon region using the importance-performance analysis (IPA) based on visitors' responses in several dimensions of the destination. The study comprised two phases. In the first one, visitors to the Lisbon region identified its main pull factors. Based on the literature review and according to experts on tourism, the pull factors specified by the visitor sample were classified into: "Culture, History and Architectural Heritage", "Gastronomy", "Scenic Views and Landscapes", "Climate and Weather", "Safety and Security", "Nightlife", "Language accessibility (English-speaking locals)", "Hospitality and Friendliness of the Locals", "Authenticity", and "Events and Festivals". In the study's second phase, these ten dimensions were used as the basis for the IPA model. Through a second questionnaire, visitors of the Lisbon region rated the importance of each pull factor and, simultaneously, its performance according to their current experience in the region.

The results revealed that, on a seven-point Likert scale, all the attributes rated importance above the middle of the scale. The most important attributes for visitors were "Gastronomy", "Scenic Views and Landscapes", "Safety and Security", and "Language accessibility", with a mean above six and a median of seven. In terms of visitors' perceptions of the performance of the region's attributes, "Culture", "History and Architectural Heritage", "Gastronomy", "Scenic Views and Landscapes", "Climate and Weather", and "Language Accessibility" received the highest ratings, with a mean above six and a median of seven. "Events and Festivals" received the lowest rating, with a mean of 4.72 and a median of four. Regarding gap analysis (the difference between performance and importance), seven attributes have performance evaluations better than the given importance, with only three showing performance lower than the importance: "Safety and Security", "Hospitality and Friendliness of the Locals", and "Authenticity", despite all having high-performance rates.

In conclusion, as a tourist destination, the Lisbon area is very well evaluated by its visitors concerning the identified pull factors. Notwithstanding, there are practical and theoretical implications of these results. The findings of this study are expected to contribute to the field's literature and provide valuable insights for tourism in the area by 1) identifying contemporary pull factors, 2) characterising the performance of the tourism sector, and 3) highlighting the gaps between the perception of the attributes that initially draw the tourist to Lisbon and their actual performance. For practitioners, the findings help inform public policies for destination managers and the city council of Lisbon and the decision-making of all regional tourism operators. From an academic standpoint, this paper fills a gap in the tourism literature by applying the model to tourist data, demonstrating the importance of a multi-stakeholder approach to identifying a destination's attributes for competitiveness.

Further research should complement these results with the perception of tourism operators regarding the identified attributes. This approach would allow for investigating potential differences in the importance and perception of performance between tourism operators and tourists. Moreover, because tourists from different geographical areas have different needs and demands, exploring additional attributes or expanding the set used in this study is critical. Further statistical analysis, such as multiple regression, could help determine which attributes predict tourists' overall opinion of the Lisbon region as a destination. Benchmarking analysis, comparing other European destination cities, could also be an interesting line of research.

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References

- Abalo, J., Varela, J. and Manzano, V. (2007) "Importance values for Importance-Performance Analysis: A formula for spreading out values derived from preference rankings", *Journal of Business Research*, Vol 60, No 2, pp 115–121, <https://doi.org/10.1016/j.jbusres.2006.10.009>
- Akinci, Z. and Özküz, E., N. (2022) "The local people's view in tourism context of sustainable tourism principles: An Importance-Performance Analysis", *Advances in Hospitality and Tourism Research*, Vol 10, No 4, pp 501-529, <https://doi.org/10.30519/ahtr.894259>
- Azzopardi, E. and Nash, R. (2013) "A critical evaluation of importance-performance analysis", *Tourism Management*, Vol 35, pp 222–233, <https://doi.org/10.1016/j.tourman.2012.07.007>.
- Bi, J.W., Liu, Y., Fan, Z.P. and Zhang, J. (2019) "Wisdom of crowds: Conducting importance-performance analysis (IPA) through online reviews", *Tourism Management*, Vol 70, pp 460–478.
- Busacca, B. and Arbore, A. (2011) "Rejuvenating importance-performance analysis", *Journal of Service Management*, Vol 22, No 3, pp 409–429, <https://doi.org/10.1108/09564231111136890>.
- Câmara Municipal de Lisboa. (2022) "Lisboa, The Economy in Figures 2022", [online], https://www.lisboa.pt/fileadmin/cidade_temas/economia_inovacao/documentos/LisboaN2022_EN.pdf.
- Coghlan, A. (2012) "Facilitating reef tourism management through an innovative importance-performance analysis method", *Tourism Management*, Vol 33, No 4, pp 767–775, <https://doi.org/10.1016/j.tourman.2011.08.010>
- Correia, A., Kozak, M. and Ferradeira, J. (2013) "From tourist motivations to tourist satisfaction", *International Journal of Culture, Tourism and Hospitality Research*, Vol 7, No 4, pp 411-424, <https://doi.org/10.1108/IJCTHR-05-2012-0022>
- Crompton, J.L. and Duray, N.A. (1985) "An Investigation of the Relative Efficacy of Four Alternative Approaches to Importance-Performance Analysis", *Journal of the Academy of Marketing Science*, Vol 13, No 4, pp 69–80, <https://doi.org/10.1177/009207038501300405>
- Cronin, J.J., and Taylor, S.A. (1992) "Measuring Service Quality: A Reexamination and Extension", *Journal of Marketing*, Vol 56, No 3, <https://doi.org/10.2307/1252296>
- Dwyer, L., Forsyth, P. and Rao, P. (2000) "The price competitiveness of travel and tourism: A comparison of 19 destinations", *Tourism Management*, Vol 21, No 1, pp 9–22, [https://doi.org/10.1016/S0261-5177\(99\)00081-3](https://doi.org/10.1016/S0261-5177(99)00081-3)
- Dwyer, L. and Kim, C. (2003) "Destination competitiveness: Determinants and indicators", *Current Issues in Tourism*, Vol 6, No 5, pp 369–414, <https://doi.org/10.1080/13683500308667962>
- Goo, J., Huang, C.D., Yoo, C.W. and Koo, C. (2022) "Smart Tourism Technologies' Ambidexterity: Balancing Tourist's Worries and Novelty Seeking for Travel Satisfaction", *Information Systems Frontiers*, Vol 24, No 6, pp 2139–2158, <https://doi.org/10.1007/s10796-021-10233-6>
- Hawes, J.M. and Rao, C.P. (1985) "Using Importance-Performance Analysis to develop health care marketing strategies", *Journal of Health Care Marketing*, Vol 5, No 4, pp 19–25.
- Lai, I.K.W. and Hitchcock, M. (2015) "Importance-performance analysis in tourism: A framework for researchers", *Tourism Management*, Vol 48, pp 242–267.
- Leask, A. (2016) "Visitor attraction management: A critical review of research 2009–2014", *Tourism Management*, Vol 57, pp 334–361, <https://doi.org/10.1016/j.ijedudev.2017.12.007>
- Lee, E., Chung, N. and Koo, C. (2023) "Exploring touristic experiences on destination image modification", *Tourism Management Perspectives*, Vol 47, pp 101-114, <https://doi.org/10.1016/j.tmp.2023.101114>
- Mangion, M.L., Durbarry, R. and Sinclair, M.T. (2005) "Tourism competitiveness: Price and quality", *Tourism Economics*, Vol 11, No 1, pp 45–68, <https://doi.org/10.5367/0000000053297202>
- Martilla, J.A. and James, J.C. (1977) "Importance-Performance Analysis", *Journal of Marketing*, Vol 41, No 1, <https://doi.org/10.2307/1250495>
- Morgan, M., Lugosi, P. and Ritchie, J.B. (2010) "The tourism and leisure experience: Consumer and managerial perspectives", Channel View Publication
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- Oh, H. (2001) "Revisiting importance-performance analysis", *Tourism Management*, Vol 22, pp 617–627, [https://doi.org/10.1016/S0261-5177\(01\)00036-X](https://doi.org/10.1016/S0261-5177(01)00036-X)
- Padma, P. (2016) "Strategic quadrants and service quality: Tourist satisfaction in Portugal", *Quality Management Journal*, Vol 23, No 2, pp 57–70, <https://doi.org/10.1080/10686967.2016.11918471>
- Pearce, P. and Benckendorff, P. (2006) "Journal of Quality Assurance in Hospitality & Tourism Benchmarking, Usable Knowledge and Tourist Attractions", *Journal of Quality Assurance in Hospitality & Tourism*, Vol 7, pp 29–52, <https://doi.org/10.1300/J162v07n01>

- Pestana, M. H., Parreira, A. and Moutinho, L. (2020) "Motivation, emotions and satisfaction: The keys to a tourism destination choice", *Journal of Destination Marketing & Management*, Vol 16, 100332, <https://doi.org/10.1016/j.jdmm.2018.12.006>
- Quan, L., Kim, K., K, and Han, H.(2022) "Customer views on comprehensive green hotel selection attributes and analysis of importance-performance", *Journal of Travel & Tourism Marketing*, Vol 39, No 6, pp 535-554, <https://doi.org/10.1080/10548408.2022.2162657>
- Rosário, J. F., Calisto, M., L. Machado, A. T., Gustavo, N. (2022). "Importance-Performance Analysis of Tourism Destination Attractiveness: Technology and Other Influencing Factors", *Optimizing Digital Solutions for Hyper-Personalization in Tourism and Hospitality*, IGI Global, pp 231-254, <https://doi.org/10.4018/978-1-7998-8306-7.ch012>
- Rita, P., Brochado, A. and Dimova, L. (2019) "Millennials' travel motivations and desired activities within destinations: A comparative study of the US and the UK", *Current Issues in Tourism*, Vol 22, No 16, pp 2034–2050, <https://doi.org/10.1080/13683500.2018.1439902>
- Ritchie, J.R.B. and Crouch, G.I. (2003) "The Competitive Destination: A Sustainable Tourism Perspective", CABI Pub, Oxon.
- Sarra, A., Zio, S. D. and Cappucci, M. (2015) "A quantitative valuation of tourist experience in Lisbon", *Annals of Tourism Research*, Vol 53, pp 1-16, <http://dx.doi.org/10.1016/j.annals.2015.04.003>
- Skalska, T. (2023). "Identifying quality gaps in tourism for people with disabilities: Importance-Performance Analysis (IPA)", *Turyzm/Tourism*, Vol 33, No 1, pp 41–48, <https://doi.org/10.18778/0867-5856.33.1.04>
- Tonge, J. and Moore, S.A. (2007) "Importance-satisfaction analysis for marine-park hinterlands: A Western Australian case study", *Tourism Management*, Vol 28, No 3, pp 768–776, <https://doi.org/10.1016/j.tourman.2006.05.007>
- Wu, H., Jimura, T. (2019), "Exploring an Importance–Performance Analysis approach to evaluate destination image", *Local Economy*, Vol 34, No 7, pp 699-717.