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The structural relationships between residents' tourism-phobia, life satisfaction, length of residence and political leaning

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Samuel Montesdeoca, Yen E. Lam-González, Carmelo J. León & Javier de León

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The structural relationships between residents' tourism-phobia, life satisfaction, length of residence and political leaning

Abstract

Tourism-phobia is a measure of residents' annoyance by tourism based on the perceived impacts of the activity for their community. Understanding what shapes residents' opinions on tourism impacts is necessary to comprehend tourism-phobia fully. This paper aims to analyse personal factors that have been insufficiently addressed, such as *life satisfaction*, *length of residence* and *political leaning* to explain residents' tourism-phobia. A covariance-based structural equation model was used and empirically validated with self-reported information from 300 residents in the Canary Islands (Spain) who filled-in an online questionnaire. The results support previous hypotheses stating that annoyance intensifies when the perceptions of negative impacts (costs) increase and positive perceptions (benefits) decrease. Data also indicate that long-term residents perceive fewer benefits from tourism and are more likely to develop a phobia. Life satisfaction does not directly impact phobia but has an indirect effect due to its capacity to shape how individuals appraise tourism. Finally, a negative indirect effect of political leaning was found. Right-leaning residents perceive tourism as having more benefits than left-leaning residents. The findings provide a broader understanding of the root causes of tourism-phobia and offer a useful framework for identifying residents most sensitive to tourism's impacts. This ultimately helps plan future management actions to cultivate resident-friendly tourism destinations.

Keywords: tourism- phobia; residents; life satisfaction; political leaning

Introduction

Increasing studies assess the multifaceted forms of impacts of tourism on resident communities, but research on the perceptions and feelings of the affected communities about tourism impacts remain insufficient (Godovykh et al., 2023). Opinions about tourism have potential to shape residents' subjective well-being and can lead to negative sentiments (Chen et al., 2021a; Godovykh et al., 2024).

In this vein, tourism-phobia emerges as a polysemous concept which captures feelings of irritation and/or annoyance by tourism (Almeida-García et al., 2021; Veríssimo et al., 2020; Ramos & Mundet, 2021). Evidence shows that tourism-phobia leads to behavioural consequences -i.e., protests, and residents' unwillingness to support tourism growth (Caro-Carretero & Monroy-Rodríguez, 2025; Matiza, 2024), which poses a challenge for sustainable development.

Tourism-phobic residents have been profiled according to demographic and socioeconomic factors (Cadima Ribeiro et al., 2025; Sharma & Gursoy, 2015). Other aspects such as quality of life, self-identity, receiving personal benefits from tourism, trust in governmental decisions (Gursoy et al., 2019; Nunkoo & So, 2016; Rodrigues et al., 2024; Silva et al., 2025), human values (Silva et al., 2025) and environmental and sustainability norms (Ramos & Mundet, 2021) are also relevant in explaining heterogeneous feelings and attitudes toward tourism. But there is consensus that negative feelings toward tourism intensify when residents consider that the negative impacts of the activity outweigh the positive impacts, which aligns with the Social Exchange Theory (Żemła, 2020; Nunkoo & So, 2016).

In turn, opinions about tourism are the most prominent factor that explain negative feelings of residents (Silva et al., 2025; Veríssimo et al., 2020). Paradoxically, much remains to be explored regarding the personal factors that shape residents' opinions of and attitudes towards tourism (Godovykh et al., 2024).

This study addresses this gap by proposing and testing a structural model about the relationship between tourism-phobia and the length of residence, life satisfaction, and political leaning as ideology. The study is thus concerned with how these factors can shape residents' opinions of the impacts of tourism that give rise to tourism-phobia.

The study has three research objectives. First, previous works state that individuals who are very satisfied with their life might be more optimistic about tourism's impacts on their communities, whereas those with lower life satisfaction might be more sensitive to its drawbacks (Pai et al., 2024). Other studies found no significant relationship between these variables (Nunkoo & So, 2016; Sharma & Gursoy, 2015). In light of the mixed evidence, the present paper aims to crystallise the impact of life satisfaction on how residents perceive both the positive and negative impacts of tourism that drives tourism-phobia. It is also concerned with the potential direct impact of life satisfaction on phobia sentiments.

Secondly, there is no conclusion as to whether the length of residence may reinforce positive and/or negative opinions of tourism impacts. Various studies confirm that the most negative perceptions and attitudes toward tourism can be found within long-term residents (Caro-Carretero & Monroy-Rodríguez, 2025; Sharma & Gursoy, 2015) because they are more resistant to all the changes brought by tourism development - e.g., increased living costs and gentrification (Pai et al., 2024). Other studies contradict the previous hypothesis with alternative models where the length of residence does not have a significant role in explaining higher negative opinions about tourism (Nunkoo et al., 2013). These latter authors confirm the relationship between residence length and perceived positive impacts and reject the existence of any relationship with the negative impacts. The present study aims to provide recent proof by analysing whether the length of residence differently affects the positive and negative opinions of locals.

Thirdly, political ideology – or partisan identity - plays a role in shaping people's views of many aspects, including the costs and benefits of tourism. Although this is a novel research topic (Lieberthal et al., 2024), there is some recent evidence that social discontents with tourism appear more often in certain political contexts (Opp, 2022). In the absence of studies on ideology and tourism-phobia, our approach is exploratory. We hypothesise that political leaning influences residents' perceptions of tourism impacts, whether positive or negative. This allows us to test whether one's ideological stance directly correlates with differing opinions on tourism and indirectly with tourism-phobia, which ultimately depends on the balance of these impacts.

Self-reported information from 300 residents of the Canary Islands (Spain) who filled in an online questionnaire was used for empirical estimation of the model. The Canary Islands is a pertinent case study as it is Europe's most visited region (Eurostat, 2024). The archipelago is facing well-documented challenges, including pressure on local infrastructure, rising housing prices, environmental strain, and periodic resident backlash against tourists (Sánchez-Bayón & Daumann, 2025). By examining a mature 'sea sun and sand' destination, our study captures the dynamics of tourism-phobia in a context where issues of over-tourism are especially salient.

The contribution lies in assessing personal factors that have received scant attention in literature (Caro-Carretero & Monroy-Rodríguez, 2025). It has validated a competing structural model about the root causes of tourism-phobia, which ultimately helps to plan future management actions to cultivate more resident-friendly tourism destinations. The findings help differentiate resident population groups that need extra compensatory benefits that offset their perceptions of negative impacts that turn them discontent with tourism.

The article is structured as follows: first, we review the relevant theoretical background and literature on the antecedents and consequences of tourism-phobia, residents' perceptions of tourism impacts, and factors with potential role in shaping residents' opinions and feelings toward tourism. Next, we introduce the hypotheses and the proposed structural model along with the data and method used in the study. We then present the results of the empirical analysis and, finally, we discuss the implications of the findings and offer conclusions, including suggestions for future research.

Conceptual framework

Following the COVID-19 pandemic, fresh discussions emerged regarding the limits of tourism growth and 'over-tourism'. New travel patterns have been observed, with both residents and tourists preferring open spaces and less crowded destinations to enhance their quality of life and well-being (Godovykh et al., 2024). Recent work on the flip side of over-tourism - sometimes termed "under-tourism" - highlights the fact that destinations with fewer crowds can be more appealing in terms of liveability and visitor satisfaction (Pai et al., 2024; Romagosa, 2020; Seraphin & Dosquet, 2020). These debates underscore the need to reconsider how tourism development affects local people's lives and well-being (Jiricka-Pürerer et al., 2020).

In this context, new evidence and studies on residents' discomfort with (over)tourism impacts have proliferated (Ramos & Mundet, 2021; Verisimo et al., 2020). The phenomenon has gained attention alongside the surge of tourism in hotspots like Barcelona and the Canary Islands (Spain), or in Venice (Italy), to the point that it has become a common term in both academia and the media more recently (Ramos & Mundet, 2021).

Studies indicate that irritation and annoyance of residents often arises when tourism growth degrades residents' quality of life through issues such as gentrification, crowding and congestion, rising housing costs, commodification of public spaces, and precarious employment, among other things (Nunkoo & So, 2016; Źemła, 2020). Residents' negative feelings toward tourism thus represent a social backlash against the adverse impacts of over-tourism (Almeida-García et al., 2021).

The baseline studies in this field were carried out by Doxey (1975) and Butler (1980). They pointed out that residents' irritation overlaps with the consequences of over-tourism. More recently, tourism-phobia appears as an increasingly related term to the annoyance and irritation of residents (Almeida-García et al., 2021), since it was coined by Delgado (2007). This section summarises the results of a literature review about the studied causes of tourism-phobia that support our research hypotheses.

Tourism-phobia

Tourism-phobia captures negative feelings and broader forms of social discontent with tourism growth, governance models, and processes of touristification (Romero et al., 2019). The meaning and scope of the concept vary across contexts and research objectives (Almeida-García et al., 2021; Veríssimo et al., 2020; Ramos & Mundet, 2021). Some authors measure tourism-phobia as discomfort, irritation (Verisimo et al., 2020) or annoyance by tourists' behavior (party, waste, noise), economic impacts (housing rental prices) or tourism in general (Almeida Garcia et al., 2021).

A more critical strand of literature highlights that tourism-phobia has been mobilised as a media and political label—often in an alarmist manner and interchangeable with terms such as “anti-tourism sentiment”—to frame and delegitimise resident claims and social movements (Romero et al., 2019). This plurality of interpretations reflects the limited theoretical consolidation of the concept. Despite this,

tourism-phobia remains a useful measure of society's emotional response to overtourism with significant behavioural consequences that need appropriate attention (Ramos & Mundet, 2021).

Outcomes of tourism-phobia may include protests, graffiti campaigns, (Caro-Carretero & Monroy-Rodríguez, 2025; Ko & Stewart, 2002). But tourism-phobia should not only be seen as a signal of social conflicts in destinations (Pai et al., 2024), as there is evidence of greater engagement in sustainability policies by discontented population (Oviedo-García et al., 2008; Bisht et al., 2025; Ramos & Mundet, 2021). New approaches reveal that feelings of phobia also shape perceived safety and health concerns (Matiza, 2024).

Regarding its causes, tourism-phobia is primarily led by the perceptions of tourism impacts (Milano et al., 2019; Sánchez-Bayón & Daumann, 2025) at social, economic, cultural, and environmental levels (Almeida-García et al., 2021; Nunkoo & So, 2016). The more of a positive perception of impacts residents have - e.g., on jobs, income, improved infrastructure, etc. - the less likely they are to experience tourism-phobia. Whereas higher negative perceptions - e.g., crowding, gentrification, etc. (Almeida-García et al., 2021) - breed opposition, hostility or “phobia” (Ramos & Mundet, 2021; Sánchez-Bayón & Daumann, 2025).

This aligns with Social Exchange Theory, which posits that individuals’ support for (or opposition to) tourism is driven by an internal analysis of costs and benefits of the interaction between the host community and the tourism industry (Nunkoo et al., 2013). With this reasoning, we propose the first two hypotheses as a continuation and more recent proof of previous findings:

H1: The more positive residents’ opinions are about the impacts of tourism, the less likely they are to exhibit tourism-phobia.

H2: The more negative residents’ opinions are about the impacts of tourism, the more likely they are to exhibit tourism-phobia.

However, the same impact can be perceived differently from one individual to another (Godovykh et al., 2024). At this point, the question is what factors shape residents’ positive and negative opinions of tourism?

Positive impacts of tourism and residents’ perceptions

Tourism encompasses all activities related to the movement of people to other places, involving overnight stays (Netto, 2009). It is a phenomenon with social, cultural and economic implications for host communities and beyond (Archer et al., 2012). The benefits of tourism have been the subject of extensive academic analysis and have evolved into a consolidated field of study (Andereck et al., 2005; Postma & Schmuecker, 2017; Šegota et al., 2017; Woo et al., 2018).

Among the most notable benefits of tourism are its ability to stimulate economic growth (Li et al., 2018), generating public and private revenue (Blake et al., 2008; Cárdenas-García et al., 2015), and promote tourism exports (Gnangnon, 2020). It can also contribute to poverty reduction (Zhao & Xia, 2020), job creation (Scheyvens & Russell, 2012), higher income levels (Ren et al., 2019) and improved quality of life. (Haralambopoulos & Pizam, 1996; Woo et al., 2018). Other benefits include higher levels of satisfaction (Lin et al., 2017), happiness (Godovykh et al., 2023; Seraphin & Dosquet, 2020), and active community involvement in cultural heritage management and value creation (Chen et al., 2021a).

However, some factors cause residents to see the benefits of tourism through different lenses. At the level of demographic and socio-economic factors, there are heterogeneous findings regarding the distribution by age, gender, information sources and place of residence of those who best value the impacts of tourism

(Caro-Carretero & Monroy-Rodríguez, 2025; Lewicka, 2011; Rodrigues et al., 2023; Šegota et al., 2017; Silva et al., 2025; Veríssimo et al., 2020).

Regarding personal factors, there is consensus that life satisfaction makes individuals more optimistic about their community's situation because of the interaction with tourism (Woo et al., 2018). Furthermore, working in the tourism industry or being a property owner exploiting holiday rentals also shape perceptions of impacts (Sánchez-Bayón & Daumann, 2025). These individuals have economic reasons to evaluate the activity more positively (Sánchez-Bayón & Daumann, 2025). Other studies have proved that having power in tourism (Nunkoo & So, 2016), living in rural contexts (Caro-Carretero & Monroy-Rodríguez, 2025), feeling involved as citizen in decision making and planning, as well as the opportunity to interact with tourists, make residents more likely to value tourism with positivism (Alrwajfah et al., 2021).

Negative impacts of tourism and residents' perceptions

Various studies highlight the adverse effects of tourism. The main economic problems include the replacement of traditional markets (Connell, 2005), the rising cost of living (Romero et al., 2019; Ross, 1992), investments in tourism infrastructure with no economic return (Johnson et al., 1994), and increased inequalities in both wealth distribution and income (Fang et al., 2021). Furthermore, a widening poverty gap (Cárdenas-García et al., 2015; Mahadevan & Suardi, 2019), difficulties in accessing housing (Mikulić et al., 2021), problems arising from seasonality (Duro & Turrión-Prats, 2019) and oversaturation (Popp, 2012; Sánchez-Bayón & Daumann, 2025; Scuttari et al., 2013; Żemła, 2020) have been documented.

At the social level, tourism can increase crime (Altindag, 2014), drug trafficking (Usher & Kerstetter, 2014), alcoholism (Windarti, 2019), vandalism (Bhati & Pearce, 2017), decreased life satisfaction (Bimonte et al., 2019) and the erosion of local traditions (Mbaiwa, 2011). It has also been linked to the spread of disease (Chen et al., 2021b), and higher levels of stress (Jordan et al., 2019) in host communities.

From an environmental perspective, the negative effects of tourism have been widely documented (Buckley, 2009; Fang et al., 2021; Zhang et al., 2015). Examples are air and water pollution (Zhang et al., 2020), overexploitation of natural resources (Drius et al., 2019), wildlife and wetland degradation (Padilla, 2015; Trave et al., 2017), and deforestation (Boori et al., 2015). In their study of different destinations Godovykh et al., (2024) found that residents tend to view tourism more negatively in its relationship with the environment. On the contrary, residents generally perceive higher positive impacts of tourism related to economic aspects.

Concerning factors that worsen negative opinions, low levels of education lead residents to evaluate tourism more negatively, especially when there is no possibility to learn other languages or access employment in the sector (Cadima Ribeiro et al., 2025). Moreover, the impossibility of affording the increased costs of living makes residents more prone to see higher negative impacts (Sánchez-Bayón & Daumann, 2025). Residents who feel that they are marginalised in political decisions may also experience higher negative impacts (Sánchez-Bayón & Daumann, 2025). Recent studies since the COVID-19 pandemic found that the more negative opinions about tourism are present in those individuals with greater health concerns (Godovykh et al., 2023; Matiza, 2024).

Life satisfaction

Life satisfaction is an individual subjective assessment of well-being (Bimonte et al., 2019; Nunkoo et al., 2013; Woo et al., 2018). Many factors boost the perceived life satisfaction of people residing in tourist areas (Nunkoo & So, 2016), - e.g the improvement of urban areas and the new recreational and job opportunities,

or cultural vibrancy (Nunkoo & So, 2016; Woo et al., 2018). Negative impacts such as higher living costs, congestion, or social disruption, etc. can detract from life satisfaction (Bimonte et al., 2019; Lin et al., 2017). Pai et al., (2024) state that residents who perceive more benefits from tourism report more life satisfaction, while those who perceive more costs often report less satisfaction. More recently, research in the post-pandemic has focused on predicting how ‘under-tourism’ and ‘degrowth’ may improve residents’ perceived quality of life (Pai et al., 2024).

However, life satisfaction is a broader construct that stands for residents’ holistic perceptions of well-being. In turn, residents’ *pre-existing positive sense of life satisfaction* may colour their opinions and attitude toward tourism development (Pai et al., 2024). Consequently, studies have started examining the reverse effect - that is how residents’ greater life satisfaction leads to more positive appraisals of tourism’s value (Lin et al., 2017). This indicates that the causality can work in both directions. But knowledge in this latter area is still very fragmented and does not arrive at a conclusion.

Lin et al., (2017) suggest that being happy with their lives makes residents more optimistic and appreciative of their community’s situation, and more likely to engage constructively with tourists. According to Nunkoo & So (2016), the reverse can also occur: residents with low life satisfaction might be predisposed to see new developments like tourism in a negative light, blaming tourism for broader social or economic frustrations. Alternatively, other studies did not find a causal relationship between perceived quality of life and residents’ opinions of tourism (Sharma & Gursoy, 2015). Concerning tourism-phobia, the relationship has not been documented (Woo et al., 2018).

With this study, we aim to fully crystallise the implications of life satisfaction on how residents perceive both positive and negative impacts of tourism and develop tourism-phobia. The model outlines that life satisfaction has direct and indirect effects on tourism-phobia, leading to the following three hypotheses:

H3: Residents’ overall life satisfaction has a negative effect on tourism-phobia – that is, *higher* levels of life satisfaction lead to *lower* feelings of tourism-phobia.

H3a: Greater life satisfaction leads residents to hold more positive opinions about the impacts of tourism on their community.

H3b: Greater life satisfaction leads residents to hold fewer negative opinions (or to downplay the negatives) about the impacts of tourism on their community.

H3a and H3b further specify the nuanced ways life satisfaction might influence the perception of tourism: more satisfied residents are expected to emphasise benefits and be less bothered by costs. With these two hypotheses we are also assuming a mediating role of opinions about tourism in the relationship between life satisfaction and tourism-phobia.

Length of Residence

The time residents have lived in a destination shape their attitudes toward that place (Nunkoo et al., 2013). People who have lived longer in a community tend to develop stronger bonds and a deeper sense of identity. In turn, the length of residence is positively associated with place attachment and place identity (Pai et al., 2024). Long-term residents often feel more emotionally invested in their hometown, more protective of its character, and more sensitive to changes in the local environment (Lewicka, 2011).

Being born and raised in a place or having lived there for decades typically means one has a clear baseline of “how things used to be” (Caro-Carretero & Monroy-Rodríguez, 2025). This can sharpen reactions to

changes like those brought by tourism development (Pai et al., 2024). On the other hand, newer residents or recent arrivals may also form attachments, but their sense of identity with the place might be less intense due to fewer long-term memories (Lewicka, 2011). Newer residents thus present relatively less place identity and are consequently less sensitive to the changes (Lewicka, 2011).

This has implications for attitudes toward tourism. For instance, some studies confirm that the most negative attitudes toward tourism are found in long-term residents (Caro-Carretero & Monroy-Rodríguez, 2025; Sharma & Gursoy, 2015). Other studies contradict the previous hypothesis and affirm that the length of residence does not have a significant role in reinforcing negative opinions about tourism. These authors argue that tourism has traditionally been seen as having multiple benefits for host communities- e.g., infrastructure, transport, etc. Born and long-term residents have had the opportunity to witness this evolution over time. In turn, they may become less appreciative of tourism's benefits due to nostalgia for pre-tourism conditions or cumulative frustration with changes in the community (Nunkoo & So, 2016), but it does not amplify negative perceptions. Given the mixed evidence, we put forward two hypotheses assuming *residence duration* as a determining factor of both positive and negative perceptions of tourism impacts.

H4a: Long-term residents see tourism as having greater negative impacts on their community than shorter-term residents.

H4b: Long-term residents see tourism as having less positive impacts on their community than shorter-term residents.

This implies that individuals who have lived in the community all or most of their lives (especially native-born residents) are likely to be more phobic compared to those who moved there more recently, as the former perceive that there are higher costs and fewer benefits from the interaction with tourism. H4a and H4b further specify, for the first time in tourism literature, the indirect impacts of residence duration on phobia sentiments, assuming that pro-tourism residents are those who emphasise the benefits and are less bothered by costs, which is a feature of residents who have lived less time at the destination.

Political leaning (ideology)

Political partisanship – falling on the spectrum from left-wing to right-wing – influences everyday behaviours and perceptions of the economy, society, immigration etc. Individuals with different political leanings often prioritise different values and interpret societal changes through those value lenses. (Indelicato & Martín, 2022; Karasmanaki & Tsantopoulos, 2021).

The link between partisan identity and attitudes towards tourism is a novel topic (Lieberthal et al., 2024). Ideology might colour how people evaluate the benefits and drawbacks of tourism development. For example, during the COVID-19 pandemic, researchers observed that people's risk perceptions and behaviours (including attitudes toward travel restrictions and local tourism) were associated with their political affiliations – with those at the political extremes sometimes interpreting the situation in line with their ideological narratives (Lieberthal et al., 2024).

More broadly, partisan identity has proven to be a strong predictor of beliefs about environmental and developmental issues (Nunkoo & Gursoy, 2012). A striking illustration is in the context of climate change: “*US Republicans are six times more likely to dismiss the role that humans play in climate change than Democrats.*” This gap highlights how liberals and conservatives can experience the same phenomenon yet perceive it very differently due to ideological filters.

According to institutional theory, institutions and governments mark the funds and capacities to mobilise resources and fight against overcrowding and other tourism externalities that affect residents' wellbeing. In turn, the pursuit of the goals that society expects about the minimisation of negative impacts from tourism ultimately depends on the political parties and their organisational culture (Sánchez-Bayón & Daumann, 2025). In this sense, the study of Nunkoo & Gursoy, (2012), suggest that the level of trust in government actors has a significant role in shaping residents' opinions about tourism (Nunkoo & So, 2016; Rodrigues et al., 2024). Residents who trust the government more are more likely to view the impacts of tourism positively. More recently Indelicato & Martín (2022) discovered that right-wing citizens tend to be more optimistic about the work of political elites.

In his side Opp (2022) proved that discontentment and protests against tourism appear in certain political contexts. All these abovementioned authors state that their findings are inconclusive until new evidence can confirm it. As there are no studies on whether society's opinions and feelings about tourism are caused by their political leaning, the next two hypotheses are set:

H5a: Political ideology affects how residents view the positive impacts of tourism. (For instance, residents with a certain political leaning may be more inclined to acknowledge tourism's benefits).

H5b: Political ideology affects how residents view the negative impacts of tourism. (For example, some ideological groups might be more sensitive to tourism-related problems).

These hypotheses have some assumptions. One of them is that stronger preference for a specific partisan ideology (left or right) is an indicator of the residents' trust in how their institutions design/implement the tourism strategy. Although all individuals want to improve their living conditions and wellbeing, their opinions about whether tourism can contribute more or less to this may differ considerably in regard to the political ideology. It could be that those on one end of the linear spectrum of ideology (left/right) are more critical of tourism's impacts while the other end is more supportive (or it may not follow a linear pattern at all – the effect might be non-linear or U-shaped, for example, if both far-left and far-right share scepticism of tourism).

Methodology

The model

In order to make inferences about the research hypotheses formulated previously, a structural equation model (SEM) was employed. With this technique, linear regression relationships between several variables at the same time can be identified. These relationships are expressed through hierarchical or non-hierarchical structural equations (Eusébio & Vieira, 2013). **Figure 1** depicts the path diagram, considering all the variables described above. The model posits that perceptions of impacts mediate the relationship between personal factors (life satisfaction, length of residence and ideological orientation) and tourism-phobia. The variables drawn in boxes are actual data collected during the fieldwork and were treated as observable exogenous variables in the structural model. The latent variables were displayed as circles being exogenous constructs.

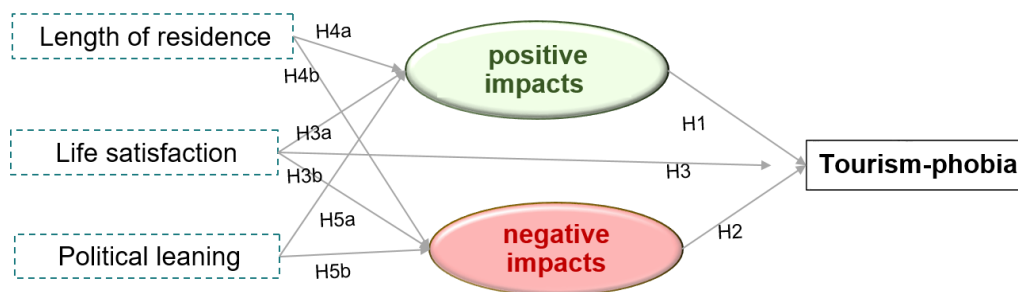


Fig 1. Theoretical model

A two-step process was adopted (Anderson & Gerbing, 1988). First, the factor structure of each of the two constructs was assessed to determine the measurement model fit. Then, the other variables (boxes) were included in one full measurement model. Finally, the complete structural model was examined to determine whether the data fitted the theoretical model and test the hypotheses.

Study site

The location chosen for the study was the Canary Islands (Spain). This archipelago has excellent natural climate conditions and geography, located between the African and American continents. This is a strength that has positioned it as the premier tourism region in Europe based on tourists' overnight stays. Over 95 million overnight stays were recorded in 2023 (Sánchez-Bayón & Daumann, 2025). This success comes with well-documented challenges, including pressure on local infrastructure, rising housing prices, environmental strain, and periodic resident backlash against tourists (Sánchez-Bayón & Daumann, 2025). By examining a mature destination, our study can capture the dynamics of tourism phobia in a context where issues of over-tourism are especially salient.

Fieldwork

Fieldwork was conducted using an online questionnaire administered in October 2022. A random sample of residents in the archipelago was obtained, reaching a total of 300 valid responses after data quality control. This sample, although not strictly probabilistic, included participants from all the islands (with greater representation from Tenerife and Gran Canaria, the most populated islands) and reflects a balanced profile by gender diversity in age and socioeconomic status. Prior to the fieldwork, one pre-test and one focus group were organised with some representative individuals.

The focus group included five men and five women (Canary Islands residents) with different education, age, gender and work status profiles. In the focus group, participants gave their opinions on the survey and its wording, pointing out some words or explanations that could be improved to avoid any misinterpretation. After necessary modifications were made, the pre-test was launched in the form of a "pilot" survey on September 2022, which did not lead to any change in the survey.

The survey

The questionnaire was structured into three blocks: (1) sociodemographic characteristics of the respondent, (2) perceptions about the impacts of tourism in their place of residence, and (3) personal questions about

their residence, political leaning, life satisfaction, and emotions regarding tourism (Lam Gonzalez & Leon, 2025). **Table 1** presents the variables in the model.

To measure perceptions of tourism impacts a reduced scale validated by Godovykh et al. (2024) was utilised. To measure tourism-phobia, we employ one single statement referred to the annoyance by tourism. This is a prominent statement utilised by previous studies (Veríssimo et al., 2020), which was later validated by Almeida-Garcia et al. (2021). Also, a global *life satisfaction* statement (subjective well-being) was used (Kapteyn et al., 2015). Respondents' political orientation was recorded by self-identification on a scale of 0 to 10, where 0 equals "far left" and 10 equals "far right." The higher values or a positive causal relationship indicates a tilt towards a far-right ideology. Finally, *residence duration* was measured categorically (less than 1 year, 1-5 years, more than 5 years, and "lifetime").

Table 1. Variables in the model.

Variables	Short description	Measurement
Life satisfaction	One single question: <i>Overall, how satisfied are you with your life?</i> (Kapteyn et al., 2015)	Likert scale from 1 to 5 (1 = "Very dissatisfied" to 5 = "Very satisfied")
Length of residence	Residence duration at the location where the individual was at the time of being interviewed	Categorical (4 items) ("Less than 1 year"; "1-5 years"; "More than 5 years"; "Lifelong")
Tourism negative perception	Seven statements from the validated scale of (Godovykh et al., 2024) about the negative impacts of tourism at social, economic and environmental levels (e.g., <i>Tourism brings air and water pollution to my community</i>)	Likert scale from 1 to 5 (1 = "Strongly Disagree"; 5 = "Strongly Agree")
Tourism positive perception	Seven statements from the validated scale of (Godovykh et al., 2024) about the positive impacts of tourism at social, economic and environmental levels (e.g., <i>Tourism provides job opportunities in my community</i>)	Likert scale from 1 to 5 (1 = "Strongly Disagree"; 5 = "Strongly Agree")
Political leaning	One item about the political leaning or political identity (Lieberthal et al., 2024)	Likert scale from 0 to 10 (0 = "Far left"; 10 = Far right)
Tourism-phobia	One item related to the presence of tourism from the scale validated by Almeida Garcia et al 2021., (<i>I am annoyed by tourism in general</i>)	Likert scale from 1 to 5 (1 = "Strongly Disagree"; 5 = "Strongly Agree")

Data analysis

Data analyses were done using IBM SPSS Statistics 29 software and AMOS29 (Bacon & Bacon, 2001). The frequency analysis was utilised to characterise the sample's socio-economic characteristics. Through a preliminary exploratory factor analysis (EFA) to the fourteen items measuring the perceptions of tourism impacts, two distinct latent dimensions – F1. Positive and F2. Negative impacts-consistent with theoretical design - were obtained. These dimensions jointly explained more than 50% of the total variance of the

sample and exhibited adequate levels of internal consistency (Cronbach's $\alpha = 0.758$ for the positive impacts scale and 0.715 for the negative impacts scale).

Following the traditional two-stage approach (Anderson & Gerbing, 1988), the measurement model (CFA, Confirmatory Factor Analysis) was estimated to verify the convergent and discriminant validity of the latent constructs identified previously. Then, the full structural model was run to test the hypothesised relationships. The fit of the measurement model was assessed using standard indices; the Chi-square/degrees of freedom (χ^2/df) index, the CFI (Comparative Fit Index), the RMSEA (Root Mean Square Error of Approximation), and the CMIN/DF (normalised chi-square). Conventional criteria were used to determine a good fit: a CFI close to or greater than 0.95 and an RMSEA less than 0.08 indicate an acceptable fit of the model to the sample data (Nunkoo & So, 2016). The R^2 of the resulting structural equations was also evaluated to determine how much variance in the endogenous variables (perceptions and tourism-phobia index) was explained by the proposed model.

Results

Socio-demographic profile

The sample was composed of men and women in almost equal proportions, with a predominance of individuals in the 35-55 age range (46.5% of respondents). Regarding educational level, more than a third of the participants had university degrees (38%) and another 25% had technical or vocational training. Most respondents were employed (almost 50%). In terms of monthly household income, the largest group (approx. 42% of the sample) reported a net income between €1,000 and €2,000 per month. The highest representation of residents surveyed are from Tenerife (52% of the sample) and Gran Canaria (37%), the two provincial capital islands. The length of residence on the island was generally high: 59% of respondents stated they had lived there all their lives, and another 29% had resided there for more than 5 years. These data (Table 2) fit the socio-demographic structure of the population in the region as per the last census (ISTAC, 2025).

Table 2. Socio-demographic profile of the sample.

N	300
Gender	%
Female	48.7
Male	51.3
Age	%
18 - 34	25.1
35 - 55	46.5
> 55	28.4
Education level	%
Primary and secondary education	15.3
High school	20.7
Technical/vocational training	25.7
University studies	38.0
Employment status	%
Unemployed	19.0

Employee	49.7
Self-employed	11.0
Retired	9.7
Income (net monthly household income)	%
Less than 599€	13.3
Between 600€ and 1,000€	10.3
Between 1,001€ and 1,499€	22.3
Between 1,500€ and 2,000€	19.0
Between 2,001€ and 3,000€	20.0
More than 3,001€	10.9
Island	%
El Hierro	0.7
Fuerteventura	2.7
Gran Canaria	37.0
La Gomera	0.7
La Graciosa	0.3
La Palma	2.7
Lanzarote	3.7
Tenerife	52.3
Residence time/length	%
Less than 1 year	1.7
1 - 5 years	10.0
More than 5 years	29.3
All my life	59.0
Marital status	%
Married	42.0
Single	32.0
Common law	16.7
Separated	6.3
Widowed	2.3
Political orientation	%
Far left	2.0
Left	34.0
Centre	34.7
Right	26.3
Far right	3.0

Measurement model

Concerning perceptions of tourism impacts, this study provides statistical validation of the same constructs of Godovykh et al. (2024). **Table 3** reports the measurement model evaluation, where items showed significant standardised factor loadings of adequate magnitude (between 0.64 and 0.77) high internal correlation within each construct. The F1 factor groups residents' opinions of the benefits that tourism

provides to their community in several areas. The F2 factor represents important costs resulting from the relationship between tourism and resident communities.

The internal reliability of the latent scales was satisfactory: Cronbach's α reached 0.758 for the perceived positive impacts scale and 0.715 for the negative impacts scale, exceeding the generally accepted threshold of 0.70. Additionally, the composite reliability (CR) index was 0.834 for the positive impacts construct and 0.811 for the negative impacts construct, The Average variance extracted reaches the suggested minimum threshold of 0.50, indicating adequate convergent validity of the measures (each construct explains at least half of the variance in its indicators).

Table 3. Measurement model evaluation

Scale items	Factor loading	% of variance	Cronbach alpha	CR	AVE
F1: Positive impacts		35.41	.758	.8339	.501
Tourism increases the income (and standard of living) of the residents of my community	.726				
Tourism fosters cultural exchange in my community	.711				
Tourism provides job opportunities in my community	.706				
Tourism encourages the protection and conservation of natural resources (land and water) in my community	.700				
Tourism improves the local infrastructure, i.e., roads, transportation systems, communication networks, etc.	.696				
F2: Negative impacts		18.142	.715	.8105	.518
Tourism creates more stress (friction) for local people and tourists in my community.	.772				
Tourism causes higher rates of crime, vandalism, and illegality in my community.	.743				
Tourism causes an increase in the prices of goods and services (cost of living) in my community	.718				
Tourism brings air and water pollution to my community	.639				

Notes: Extraction Method: Principal component analysis; Rotation Method: Varimax with Kaiser Normalization.; Rotation converged in 3 iterations.

AVE = Average variance extracted; CR = Composite Reliability

Furthermore, discriminant validity was confirmed between the two second-order constructs (positive vs. negative perceptions). The estimated correlation between both factors was moderate ($r \approx 0.65$), lower than

both 0.85 (HTMT criterion) and the square root of the individual AVEs for each factor (0.71–0.72), which meets the Fornell-Larcker criteria for discriminability (see **Table 4**). In summary, the measurement model proves that the scales used reliably and distinctly capture residents' positive and negative perceptions of tourism. This rationale allows us to confidently test the proposed structural model.

Table 4. Discriminant Validity

	F1: Positive impacts	F2: Negative impacts
F1: Positive impacts	0.708	0.650
F2: Negative impacts	0.650	0.719

Note: All constructions' HTMT values were below the recommended level of 0.85.

Results of the structural model

The model shows a satisfactory overall fit to the data. The goodness-of-fit indicators were within the desired ranges, indicating that the proposed theoretical structure is consistent with the covariances observed in the sample. About the explanatory power, the model was able to account for a significant proportion of the variance in the dependent variables; 'tourism-phobia' 'F1 positive impacts' and 'F2 negative impacts'. Approximately 85%, 47% and 32% of the variance was explained respectively, according to the R square parameter. Figure 2 presents the regression weights and the sign of the effect where it was statistically significant ($p < 0.10$).

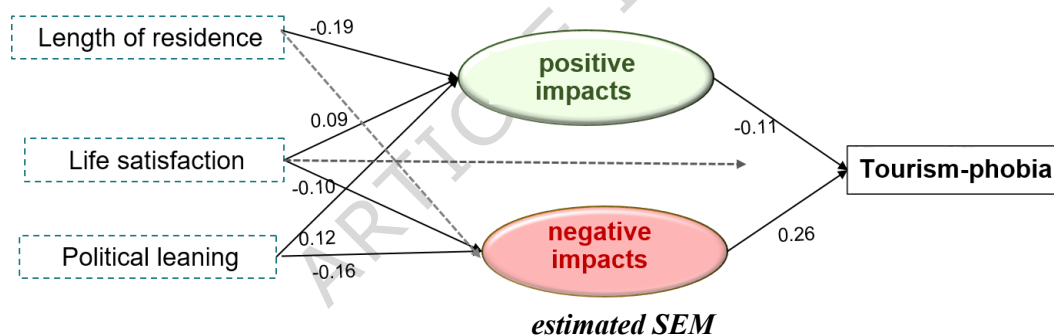


Figure 2. The

Broadly speaking, the empirical findings support most of the proposed hypotheses. Table 5 shows the general indices of the model fit, all the standardised regression coefficients, and the test results of the hypotheses. In summary, eight out of the ten hypotheses are supported. It is confirmed that positive impacts have a negative influence on tourism-phobia (H1 supported): that is, residents who more intensely perceive the benefits of tourism tend to express lower levels of phobia. Symmetrically, perceptions of negative impacts show a positive significant effect on tourism-phobia (H2 supported): the strongest negative opinions are present in the most tourism-phobic residents.

Table 5. Path coefficients and hypotheses treatment

	Effects	Stand. loadings	Hypotheses	Decision
Tourism-phobia	← Positive impacts	-0.117**	H1	Supported
Tourism-phobia	← Negative impacts	0.264***	H2	Supported

Tourism-phobia	←	Life satisfaction	-0,007	H3	Not supported
Positive impacts	←	Life satisfaction	0.096*	H3a	Supported
Negative impacts	←	Life satisfaction	-0.101*	H3b	Supported
Positive impacts	←	Residence length	-0.191***	H4a	Supported
Negative impacts	←	Residence length	-0.052	H4b	Not supported
Positive impacts	←	Political leaning	0.120**	H5a	Supported
Negative impacts	←	Political leaning	-0,162**	H5b	Supported

Note: * $p < 0.10$; ** $p < 0.05$, *** $p < 0.01$

df = 44; RMSEA=0.092; CMIN/DF=2.68; CFI=0.910, Chi square = 15,57 ***

On the other hand, resident life satisfaction did not have a significant direct effect on tourism-phobia (H3 not supported). When mediating perceptions were included in the model, the direct link between *life satisfaction* and *tourism-phobia* was statistically null. However, life satisfaction did show significant relationships with opinions of impacts: a higher level of life satisfaction was found to be positively associated with perceptions of positive impacts (H3a supported) and negatively associated with perceptions of negative impacts of tourism (H3b supported). That is, the happier people are with their personal lives, the more positive their opinion about the impacts of tourism, and vice versa. Consequently, the indirect effect of life satisfaction on tourism-phobia was confirmed: residents with greater subjective well-being are less likely to be tourism-phobic because they perceive tourism more positively (and less negatively).

Regarding length of residence, a significant relationship was found with only one of the two constructs. Longer residency was associated with less positive perceptions of tourism (H4a supported- negative effect). Its effect on perceptions of negative impacts was not significant (H4b not supported). This implies that residents tend to see fewer benefits from tourism over time. But this longevity in the place does not lead to clear differences between individuals' opinions about the harmfulness of tourism. In other words, new and long-time residents do not differ significantly in their opinions of the shadows of the tourism.

Finally, data show that residents' political orientation has an influential role in the residents' opinions of tourism impacts, as hypothesised. Ideology showed significant effects on both dimensions of impact: a more right-wing ideological position (i.e., more conservative values) was associated with more positive opinions about tourism (H5a supported) and, simultaneously, with less costs for their community, when compared to the residents with more centrist or left-wing ideologies (H5b supported). Consequently, ideological orientation indirectly influences tourism-phobia, indicating that right-wing residents are less likely to present phobia as they see tourism through more positive lenses.

Discussion

Tourism-phobia is understood in this study as a context-specific configuration of negative feelings –e.g annoyance by tourism- as a result of the balance of negative and positive impacts of tourism, which differ from one individual to another. In turn, this study analyses the structural relationships between residents' personal factors (life satisfaction, length of residence and political ideology), their perceptions of tourism's impacts, and their annoyance by tourism. It contributes to the growing sociological discourse on tourism's impacts on resident communities and the sustainability challenges of over-tourism (Caro-Carretero & Monroy-Rodríguez, 2025). This approach aligns with the notion that incorporating individual-level factors into explanatory models can improve their policy relevance and explanatory power (Vij & Walker, 2016).

From a theoretical perspective, this paper adopts an evolving, contextual, and instrumental interpretation of tourism-phobia and its causes, focusing on observable characteristics of the affected communities – political leaning, residence length. By doing this, it directly addresses the implementation gap between research insights and policy requirements. The potential to apply and test the theoretical framework of this study in other tourism contexts increases through the use of specific variables that are observable and translate relatively easy into policies.

The present paper also responds to the call to assess residents' socio-psychological variables – e.g. *life satisfaction* that explain attitudes toward tourism (Rodrigues et al., 2023). Based on Veríssimo et al.'s review (2020), this paper uses methods less commonly applied in this research field, as most authors conduct qualitative analyses using media information, discussion panels and interviews.

Overall, the results confirm that residents' perceptions of tourism's impacts are immediate determinants of their phobia. Residents who perceive more benefits from tourism are less likely to exhibit phobia than those perceiving more costs/harm. This finding is consistent and supports the social exchange theory (Godovykh et al., 2024; Veríssimo et al., 2020; Żemła, 2020) in the context of a mature, mass-tourism destination showing post-pandemic growing symptoms of over-tourism and social discontent (Sánchez-Bayón & Daumann, 2025).

To date, there was limited and mixed evidence on the potential role of life satisfaction, political ideology and the length of residence on residents' negative feelings toward tourism. This study contributes to this knowledge in three different ways. First, it shows that life satisfaction influences the lens through which people observe and assess the tourism phenomenon. The more satisfied the person with his/her live the more benevolent views of tourism. In contrast, the less satisfied are more likely to notice the problems and less likely to applaud the benefits. This is aligned with the hypotheses of Lin et al. (2017) and Woo et al. (2018). Our study could not prove a direct influence of life satisfaction on phobia, aligned with Nunkoo & So (2016), but it does confirm an indirect impact which is double reinforced by the mediating role of positive and negative opinions.

Second, our results offer relevant nuances regarding *residence length*. We hypothesised that longer-term residents may show less recognition of tourism's benefits (compared to newcomers). This decrease in the assessment of positive impacts aligns with earlier studies (Lewicka, 2011; Nunkoo & So, 2016) and have the following reasoning: long-term residents may have normalised the improvements associated with tourism (taking them for granted and, therefore, not considering them "merits" of tourism). They may also feel that these benefits do not compensate for certain losses in their traditional lifestyle, generating nostalgia for pre-tourism conditions.

We also hypothesised that the longer residence or being born in a place lead to an amplification of negative opinions about tourism (H4b). This hypothesis is aligned with previous research of Caro-Carretero & Monroy-Rodríguez (2025) and Sharma & Gursoy (2015). However, our data do not support this hypothesis, indicating that the residence length does not influence negative opinions. In summary, our study could only confirm that residence duration deteriorates perceptions of benefits from tourism but does not reinforce negative opinions.

A third contribution is the empirical validation of the *political ideology* as a predictor of residents' views of tourism impacts and root cause of tourism-phobia. To our knowledge, few previous studies have

incorporated ideological variables into the analysis of attitudes toward tourism. Our data indicates that right-leaning individuals might emphasise the economic benefits of tourism (viewing it as an engine of growth and opportunity), while left-leaning individuals may be more attuned to tourism's costs, leading to a more critical stance. This suggests that this variable has a significant direct impact on perceptions and indirectly explains emotional reactions toward tourism. Thus, residents with conservative or right-wing orientations tend to have a more pro-tourism approach while those with more left-wing ideologies show greater sensitivity to the negative impacts and downplay tourism's benefits.

This ideological divergence in the opinion about tourism is consistent with patterns observed in other areas. For example, it has been documented that right-wing individuals tend to emphasise economic opportunities and the benefits of economic growth, while left-wing individuals tend to emphasise social justice, environmental protection, and potential negative externalities (Karasmanaki & Tsantopoulos, 2021). Our findings therefore imply that left-wingers might be more alert to tourism-related problems such as gentrification, waste, pollution and income inequality that require the intervention of the state.

More recently, a higher level of credentialism (Indelicato & Martín, 2022) and trust (Nunkoo & So, 2016; Rodrigues et al., 2024) have been found within the far-right leaning ideologies. Our study can complement these researches by proposing that right-leaning makes people more confident about the way in which tourism is managed and planned for the benefit of resident communities.

Conclusion

The present study confirms that residents' perceptions of positive and negative impacts from tourism are the immediate determinants of their tourism-phobic attitudes. Starting from these major drivers of tourism-phobia, we found significant differences between residents regarding personal factors that can also predict the likelihood of being a phobic resident. This was possible by differentiating the outcomes of their perceived well-being, political ideology and length of residence. All these factors exert a significant indirect impact on tourism phobia via their capacity to shape how tourism is appraised by individuals.

In other words, two people can objectively experience the same tourism phenomenon in their city but interpret it differently depending on their personal life satisfaction, whether they were born or are a new resident, or what their political ideology is. This partly explains why only certain segments of the population develop strong negative sentiments, while others stay neutral or even favourable to tourism despite coexisting at the same destination with the same externalities.

The practical implications are mainly related to the empirical validation of root causes of phobia that represent population characteristics easily observable and measurable today – e.g. residence length and political leaning. This allows to implement simple mechanisms for identification of most sensitive groups to tourism impacts and discover which measures could offset their negative views and thus build a more resident-based, friendly tourism destination. Other socio-psychological variables of this study – e.g. *life satisfaction* are more difficult to observe in society unless you invest in opinion polls.

Another practical implication of this work relies in the possibility to find significant factors that shape *negative opinions* of tourism (Gursoy et al., 2019). Our study was able to operationalize a construct that is influenced by individuals' life satisfaction and political ideology. Being unhappy with their personal lives and left-wing make residents more prone to seeing tourism as having high costs for their community. With this information, targeted communications strategies should emphasise local control over resources and

better showcase examples of tourism that promotes equity, regeneration and environmental conservation. This ultimately is a matter of focus on the actions to promote sustainable and ethical models, while improving public services that improve quality of life (e.g., public health infrastructure, waste management).

According to our data, longer-term residents tend to stop seeing the benefits of tourism with the same enthusiasm over time. This nuance is important for local community management in the Canary Islands. The economic dependence from tourism may have been interpreted as a stronger vulnerability factor nowadays by those who have lived and benefited from tourism for decades. Even more given evidence of COVID-19, where tourism-based economies saw greater disruption to income and employment during the lockdown. In this case, it may be useful to highlight the positive contribution that tourism provides in those areas of much social concern. This could be the fundraising capacity of tourism to accelerate decarbonisation objectives, or to encourage more public investment in safety and other alternative forms of inclusive tourism, benefiting vulnerable groups in terms of income and employment.

The study also highlights how the political ideology influences opinions of tourism. Right-wing individuals think of tourism as a more wealth generating activity and are less likely to develop anti-tourism sentiments. Having this ideology also implies more trust in market solutions in the face of externalities. This is not only academically interesting but also practically valuable. If distinct ideological groups perceive tourism differently, tailored messages to match the audience's core values could be more efficient. For instance, framing environmental conservation in terms of purity/sanctity appeals more to conservatives. By the same token, tourism initiatives can be framed to appeal to community pride and economic opportunity in conservative-leaning areas, while emphasising social justice or environmental protection in liberal-leaning areas. In sum, leveraging data on residents' political leanings can help craft more resonant policies and outreach, ultimately fostering broader support for sustainable tourism development across the ideological spectrum.

The potential generalization of the results to other tourist destinations goes beyond analysing their economic and social similarity. Other European islands such as the Balearic Islands or Malta, present similar conditions to the Canary Islands: strong economic specialization and dependence of tourism, pressure on natural and urban resources, and growing signs of social discontent with tourism (Briguglio & Avellino, 2025; Ruggieri & Platania, 2024; Sánchez-Bayón, & Daumann, 2025). In fact, this is a similar scenario of many islands and outermost regions (also SIDS) worldwide: tourism drives economic prosperity while threatening the urban and natural assets that attract visitors and deteriorate residents' quality of life (Wolf et al. 2024).

However, tourism seasonality marks an important difference. Official data confirms high tourism seasonality very clearly in most islands' destinations (Sánchez-Bayón & Daumann, 2025). This is relevant as the peak season exerts more pressure on the environment, public services, etc. Besides, as most islands rely heavily on rainfall and salinization, there is a higher risk of water shortages as hotels and tourists consume a disproportionately higher amount than inhabitants (Wolf et al. 2024). This justifies that negative perceptions among residents are stronger in the peak seasons, and probably more extensive to other segments of the population (Bimonte et al., 2019; Ruggieri & Platania, 2024) different to ours.

The island of Madeira (Portugal) shows a priori more similarity to our case. Although it is far from the mass model of the Canary Islands, there is a very low tourism seasonality. There are residents unhappy with the

rising property prices becoming unattainable, the large share of foreign tourism entities and tourist enclaves inaccessible. These are considered disturbing symptoms of overtourism that should be counteracted in advance (Majdak et al., 2022).

Hawaii or Venice seems more distant cases. The tourism market of the former is dominated by Northern America, while in the Canary Islands is dominated by European (British, German). Environmental norm-behaviour relationships differ systematically across these markets (Alimuddin & Rosnani, 2023). For Venice, although it shares with the Canary Islands high tourist pressure and evidence of constructive dialogue between discontented populations and government to adopt structural changes toward sustainability, its demographic dynamics and the heritage status of urban space generating discontent are very different from our case (Alimuddi & Rosnani, 2023).

Finally, Asia-Pacific destinations and certain areas of Japan show sign of overtourism but represent different realities that call for further comparative research. Although studies exist on perceptions of saturation, loss of cultural identity, or exclusion from the benefits of tourism, the study on negative emotions of residents - annoyance or irritation- is still in its early stages (Cheer, et al., 2018). In Japan there is prove that political identity is not associated with trust in government (Goldfinch, et al., 2023), and that social distance between residents and tourists increase with the negative opinions about the activity at social, economic or environmental levels (Thyne et al., 2022).

Limitations and Future Research Directions

This study is not exempt from limitations. For instance, residents represent only one part of the broader stakeholder spectrum that should be taken into consideration for recommendations to tourism policy. The use of an online survey may have introduced certain coverage biases -e.g., underrepresentation of people with limited internet access. Utilising self-reported information can also be subjected to some kind of social desirability bias which may not reflect actual behaviour.

Besides, some of the study's core variables were measured using single items. While this approach reduces the burden on participants and simplifies questionnaire administration, it has inherent limitations in terms of reliability, sensitivity, and the ability to capture the conceptual complexity of the phenomena analysed. Single-item measures do not allow for the assessment of internal consistency and are more vulnerable to random error (Almeida et al.2021).

Given the limitations, particularly the potential bias arising from the online surveys, ample scope opens for further research. The first step would be to diversify data collection strategies by combining face-to-face, telephone, and online surveys. This would allow for better representativeness of the sample. Furthermore, the use of probabilistic and stratified sampling designs based on socioeconomic aspects, relationship with tourism, actual participation in events would facilitate more precise comparisons between resident groups and address intention-behaviour gaps.

Integrating qualitative methods, such as in-depth interviews, focus groups, or social media content analysis, would help capture emotional and narrative nuances that surveys do not, thus enriching our understanding of the phenomenon.

In future research, adopting validated multi-item scales would improve the accuracy of estimates, strengthen the convergent and discriminant validity of the constructs, and capture more nuanced dimensions of phenomena such as tourism-phobia, life satisfaction, and ideological orientation.

It is important to acknowledge that our results refer to a mature tourist destination with unique socioeconomic characteristics and dynamics of tourism saturation. This specificity limits the direct generalization of the findings to other territories with different productive structures, levels of tourism dependence, or historical trajectories. Nevertheless, the proposed theoretical framework -centered on the interaction between perceptions of impacts, personal factors, and attitudes toward tourism- demonstrates a conceptual rigor and analytical flexibility that make it suitable for application, comparison, and expansion in other destinations and sociocultural contexts.

Last but not least, another avenue for progress lies in adopting longitudinal approaches that allow for observing how life satisfaction, perceptions of benefits and costs, and attitudes toward tourism evolve over time and can be compared according to seasonality patterns and diverse urban-coastal destinations. This would help clarify the directionality of the detected relationships and understand whether certain contextual changes -such as variations in tourist arrivals, new regulations aimed at mitigating the negative impacts of tourism, (regulating vacation rentals or implementing awareness campaigns) - act as triggers for changes in residents' attitudes. Analysing situations that function as quasi-natural experiments could provide causal evidence on how external shocks influence the emergence or intensification of feelings of rejection.

References

- Alimuddin, R. Y., & Rosnani, R. (2023). Analisis Model Gerakan Anti-Tourism Dalam Merespon Praktik Overtourism Di Barcelona, Venice, Hawaii. *Journal Of International And Local Studies*, 7(1), 41-46.
- Almeida-García, F., Cortés-Macías, R., & Parzych, K. (2021). Tourism impacts, tourism-phobia and gentrification in historic centers: The cases of Málaga (Spain) and Gdansk (Poland). *Sustainability (Switzerland)*, 13(1). <https://doi.org/10.3390/su13010408>
- Alrwajfah, M. M., Almeida-Garcia, F., & Cortes-Macias, R. (2021). The satisfaction of local communities in World Heritage Site destinations. The case of the Petra region, Jordan. *Tourism Management Perspectives*, 39, 100841. <https://doi.org/10.1016/j.tmp.2021.100841>
- Altindag, D. T. (2014). Crime and International Tourism. *Journal of Labor Research*, 35(1). <https://doi.org/10.1007/s12122-014-9174-8>
- Andereck, K. L., Valentine, K. M., Knopf, R. C., & Vogt, C. A. (2005). Residents' perceptions of community tourism impacts. *Annals of Tourism Research*, 32(4). <https://doi.org/10.1016/j.annals.2005.03.001>
- Anderson, J. C., & Gerbing, D. W. (1988). Structural equation modeling in practice: A review and recommended two-step approach. *Psychological Bulletin*, 103(3), 411. <https://doi.org/10.1037/0033-2909.103.3.411>
- Archer, B., Cooper, C., & Ruhanen, L. (2012). The positive and negative impacts of tourism. In *Global Tourism: Third Edition*. <https://doi.org/10.1016/b978-0-7506-7789-9.50011-x>
- Bacon, L. D., & Bacon, L. D. (2001). *Using Amos for structural equation modeling in market research*. Lynd Bacon & Associates Limited and SPSS Incorporated Chicago, IL.

- Bhati, A., & Pearce, P. (2017). Tourist attractions in Bangkok and Singapore; linking vandalism and setting characteristics. *Tourism Management*, 63. <https://doi.org/10.1016/j.tourman.2017.05.014>
- Bimonte, S., D'Agostino, A., Grilli, G., & Pagliuca, M. (2019). Tourist season and residents' life satisfaction: Empirical evidence from a longitudinal design in a Mediterranean destination. *International Journal of Tourism Research*, 21(3), 323-333.
- Blake, A., Arbache, J. S., Sinclair, M. T., & Teles, V. (2008). Tourism and poverty relief. *Annals of Tourism Research*, 35(1). <https://doi.org/10.1016/j.annals.2007.06.013>
- Briguglio, L., & Avellino, M. (2025). The Link between Sustainable Tourism, Tourism Carrying Capacity and Overtourism: Perspectives from Malta. In *Overtourism in Cities and Small Islands* (pp. 220-233). Routledge.
- Boori, M. S., Voženílek, V., & Choudhary, K. (2015). Land use/cover disturbance due to tourism in Jeseníky Mountain, Czech Republic: A remote sensing and GIS based approach. *Egyptian Journal of Remote Sensing and Space Science*, 18(1). <https://doi.org/10.1016/j.ejrs.2014.12.002>
- Buckley, R. (2009). Evaluating the net effects of ecotourism on the environment: a framework, first assessment and future research. *Journal of Sustainable Tourism*, 17(6), 643–672. <https://doi.org/10.1080/09669580902999188>
- Butler, R.W. (1980). The concept of a tourist area cycle of evolution: Implications for management of resources. *Can. Geograph./Géographe Canadien*, 24, 5–12.
- Cadima Ribeiro, J. A., Vareiro, L., Remoaldo, P., & Monjardino, I. C. (2025). Residents' perceptions of the impacts of tourism in the Azores archipelago (Portugal): A cluster analysis. *Tourism and Hospitality Research*, 25(2), 274–288. <https://doi.org/10.1177/14673584231205217>
- Cárdenas-García, P. J., Sánchez-Rivero, M., & Pulido-Fernández, J. I. (2015). Does tourism growth influence economic development?. *Journal of Travel Research*, 54(2), 206-221.
- Caro-Carretero, R., & Monroy-Rodríguez, S. (2025). Residents' perceptions of tourism and sustainable tourism management: planning to prevent future problems in destination management-The case of Cáceres, Spain. *Cogent Social Sciences*, 11(1), 2447398. <https://doi.org/10.1080/23311886.2024.2447398>
- Cheer, J. M., Pratt, S., Tolkach, D., Bailey, A., Taumoepeau, S., and Movono, A. (2018). Tourism in pacific island countries: A status quo round-up. *Asia & the Pacific Policy Studies*, 5(3):442–461.
- Chen, N., Hsu, C. H. C., & Li, X. (2021a). Resident Sentiment toward a Dominant Tourist Market: Scale Development and Validation. *Journal of Travel Research*, 60(7). <https://doi.org/10.1177/0047287520947799>
- Chen, S., Law, R., & Zhang, M. (2021b). Review of research on tourism-related diseases. *Asia Pacific Journal of Tourism Research*, 26(1). <https://doi.org/10.1080/10941665.2020.1805478>
- Connell, J. (2005). 'What's the Story in Balamory?': The impacts of a children's TV programme on small tourism enterprises on the Isle of Mull, Scotland. *Journal of Sustainable Tourism*, 13(3). <https://doi.org/10.1080/01434630508668555>

- Delgado, M. (2007). Turistofobia. El País. 2007. Available online:https://elpais.com/diario/2008/07/12/catalunya/1215824840_850215.html(accessed on 24 February 2026).
- Doxey, G.V. (1975). “A causation theory of visitor-resident irritants, methodology and research inferences”. In Conference Proceedings: Sixth Annual Conference of Travel Research Association (pp.195–198). San Diego.
- Drius, M., Bongiorni, L., Depellegrin, D., Menegon, S., Pugnetti, A., & Stifter, S. (2019). Tackling challenges for Mediterranean sustainable coastal tourism: An ecosystem service perspective. *Science of the Total Environment*, 652. <https://doi.org/10.1016/j.scitotenv.2018.10.121>
- Duro, J. A., & Turrión-Prats, J. (2019). Tourism seasonality worldwide. *Tourism Management Perspectives*, 31. <https://doi.org/10.1016/j.tmp.2019.03.010>
- Eurostat. (2024). *Tourism statistics - annual results for the accommodation sector*. Retrieved from https://ec.europa.eu/eurostat/statistics-explained/index.php/Tourism_statistics_-_annual_results_for_the_accommodation_sector
- Eusébio, C., & Vieira, A. L. (2013). Destination Attributes' Evaluation, Satisfaction and Behavioural Intentions: A Structural Modelling Approach. *International Journal of Tourism Research*, 15(1). <https://doi.org/10.1002/jtr.877>
- Fang, J., Gozgor, G., Paramati, S. R., & Wu, W. (2021). The impact of tourism growth on income inequality: Evidence from developing and developed economies. *Tourism Economics*, 27(8). <https://doi.org/10.1177/1354816620934908>
- Gnangnon, S. K. (2020). Impact of international tourism receipts on public revenue in developed and developing countries. *Tourism Review*, 75(5). <https://doi.org/10.1108/TR-07-2018-0090>
- Godovykh, M., Hacikara, A., Baker, C., Fyall, A., & Pizam, A. (2024). Measuring the perceived impacts of tourism: a scale development study. *Current Issues in Tourism*, 27(15). <https://doi.org/10.1080/13683500.2023.2243003>
- Godovykh, M., Ridderstaat, J., & Fyall, A. (2023). The well-being impacts of tourism: Long-term and short-term effects of tourism development on residents' happiness. *Tourism Economics*, 29(1). <https://doi.org/10.1177/13548166211041227>
- Goldfinch, S., Yamamoto, K., & Aoyagi, S. (2023). Does process matter more for predicting trust in government? Participation, performance, and process, in local government in Japan. *International Review of Administrative Sciences*, 89(3), 842-863.
- Gursoy, D., Ouyang, Z., Nunkoo, R., & Wei, W. (2019). Residents' impact perceptions of and attitudes towards tourism development: A meta-analysis. *Journal of Hospitality Marketing & Management*, 28(3), 306–333. <https://doi.org/10.1080/19368623.2018.1516589>
- Haralambopoulos, N., & Pizam, A. (1996). Perceived Impacts of Tourism: The Case of Samos. *Annals of Tourism Research*, 23(3). [https://doi.org/10.1016/0160-7383\(95\)00075-5](https://doi.org/10.1016/0160-7383(95)00075-5)

- Indelicato, A., & Martín, J. C. (2022). Two approaches to analyze whether citizens' national identity is affected by country, age, and political orientation—a fuzzy eco-apostle model. *Applied Sciences*, *12*(8), 3946. <https://doi.org/10.3390/app12083946>
- Instituto Canario de Estadística. (2025). *Censos de Población y Viviendas. 1 de enero de 2024*. Gobierno de Canarias. Recuperado de <https://www.gobiernodecanarias.org/istac/.content/noticias/censos-poblacion-y-viviendas-canarias-2024.html>
- Jiricka-Pürerer, A., Brandenburg, C., & Pröbstl-Haider, U. (2020). City tourism pre- and post-covid-19 pandemic – Messages to take home for climate change adaptation and mitigation? *Journal of Outdoor Recreation and Tourism*, *31*. <https://doi.org/10.1016/j.jort.2020.100329>
- Johnson, J. D., Snepenger, D. J., & Akis, S. (1994). Residents' perceptions of tourism development. *Annals of Tourism Research*, *21*(3). [https://doi.org/10.1016/0160-7383\(94\)90124-4](https://doi.org/10.1016/0160-7383(94)90124-4)
- Jordan, E. J., Spencer, D. M., & Prayag, G. (2019). Tourism impacts, emotions and stress. *Annals of Tourism Research*, *75*. <https://doi.org/10.1016/j.annals.2019.01.011>
- Kapteyn, A., Lee, J., Tassot, C., Vonkova, H., & Zamarro, G. (2015). Dimensions of subjective well-being. *Social indicators research*, *123*(3), 625-660
- Karasmanaki, E., & Tsantopoulos, G. (2021). Impacts of social distancing during COVID-19 pandemic on the daily life of forestry students. *Children and Youth Services Review*, *120*, 105781. <https://doi.org/10.1016/j.childyouth.2020.105781>
- Ko, D.-W., & Stewart, W. P. (2002). A structural equation model of residents' attitudes for tourism development. *Tourism Management*, *23*(5), 521–530. [https://doi.org/10.1016/S0261-5177\(02\)00006-7](https://doi.org/10.1016/S0261-5177(02)00006-7)
- Lam Gonzalez, Y. E., & Leon, C. J. (2025). Questionnaire on Perceptions of Tourism Impacts. Zenodo. <https://doi.org/10.5281/zenodo.17454889>
- Lewicka, M. (2011). On the varieties of people's relationships with places: Hummon's typology revisited. *Environment and Behavior*, *43*(5). <https://doi.org/10.1177/0013916510364917>
- Li, K. X., Jin, M., & Shi, W. (2018). Tourism as an important impetus to promoting economic growth: A critical review. *Tourism Management Perspectives*, *26*. <https://doi.org/10.1016/j.tmp.2017.10.002>
- Lieberthal, B., Jackson, S., & de Urioste-Stone, S. (2024). Risk perceptions and behaviors concerning rural tourism and economic-political drivers of COVID-19 policy in 2020. *PLOS ONE*, *19*(4), e0299841-. <https://doi.org/10.1371/journal.pone.0299841>
- Lin, Z., Chen, Y., & Filieri, R. (2017). Resident-tourist value co-creation: The role of residents' perceived tourism impacts and life satisfaction. *Tourism Management*, *61*. <https://doi.org/10.1016/j.tourman.2017.02.013>
- Mahadevan, R., & Suardi, S. (2019). Panel evidence on the impact of tourism growth on poverty, poverty gap and income inequality. *Current Issues in Tourism*, *22*(3). <https://doi.org/10.1080/13683500.2017.1375901>

- Majdak, P., Mosz, J., & Martins de Almeida, A. M. (2022). Overtourism: The impact of tourism on Madeira's social and economic environment. *Studia Ecologiae et Bioethicae*, 20(2), 79-88.
- Matiza, T. (2024). The 'xenophobic' resident: Modelling the interplay between phobic cognition, perceived safety and hospitality post the Chinese 'zero-COVID-19' policy. *Current Issues in Tourism*, 27(11), 1769–1783. <https://doi.org/10.1080/13683500.2023.2221844>
- Mbaiwa, J. E. (2011). Changes on traditional livelihood activities and lifestyles caused by tourism development in the Okavango Delta, Botswana. *Tourism Management*, 32(5). <https://doi.org/10.1016/j.tourman.2010.09.002>
- Mikulić, J., Vizek, M., Stojčić, N., Payne, J. E., Čeh Časni, A., & Barbić, T. (2021). The effect of tourism activity on housing affordability. *Annals of Tourism Research*, 90. <https://doi.org/10.1016/j.annals.2021.103264>
- Milano, C., Cheer, J. M., & Novelli, M. (2019). *Overtourism: Excesses, discontents and measures in travel and tourism*. cabi.
- Netto, A. P. (2009). What is tourism? Definitions, theoretical phases and principles. *Philosophical Issues in Tourism*, 37, 43–62. <https://doi.org/10.21832/9781845410988-004>
- Nunkoo, R., & Gursoy, D. (2012). Residents' support for tourism: An identity perspective. *Annals of Tourism Research*, 39(1), 243–268. <https://doi.org/10.1016/j.annals.2011.05.006>
- Nunkoo, R., Smith, S. L. J., & Ramkissoon, H. (2013). Residents' attitudes to tourism: A longitudinal study of 140 articles from 1984 to 2010. *Journal of Sustainable Tourism*, 21(1). <https://doi.org/10.1080/09669582.2012.673621>
- Nunkoo, R., & So, K. K. F. (2016). Residents' support for tourism: Testing alternative structural models. *Journal of Travel Research*, 55(7), 847–861. <https://doi.org/10.1177/0047287515592972>
- Opp, K.-D. (2022). *Advanced introduction to social movements and political protests*. Edward Elgar Publishing Limited.
- Oviedo-Garcia, M. A., Castellanos-Verdugo, M., & Martin-Ruiz, D. (2008). Gaining residents' support for tourism and planning. *International Journal of Tourism Research*, 10(2), 95–109. <https://doi.org/10.1002/jtr.644>
- Padilla, N. S. (2015). The environmental effects of tourism in Cancun, Mexico. *International Journal of Environmental Sciences*, 6(2), 282.
- Pai, C. K., Chen, H., Lee, T. J., Hyun, S. S., Liu, Y., & Zheng, Y. (2024). The impacts of under-tourism and place attachment on residents' life satisfaction. *Journal of Vacation Marketing*, 30(4). <https://doi.org/10.1177/13567667231164807>
- Popp, M. (2012). Positive and Negative Urban Tourist Crowding: Florence, Italy. *Tourism Geographies*, 14(1). <https://doi.org/10.1080/14616688.2011.597421>

- Postma, A., & Schmuecker, D. (2017). Understanding and overcoming negative impacts of tourism in city destinations: conceptual model and strategic framework. *Journal of Tourism Futures*, 3(2). <https://doi.org/10.1108/JTF-04-2017-0022>
- Ramos, S. P., & Mundet, L. (2021). Tourism-phobia in Barcelona: dismantling discursive strategies and power games in the construction of a sustainable tourist city. *Journal of Tourism and Cultural Change*, 19(1). <https://doi.org/10.1080/14766825.2020.1752224>
- Ren, T., Can, M., Paramati, S. R., Fang, J., & Wu, W. (2019). The impact of tourism quality on economic development and environment: Evidence from Mediterranean Countries. *Sustainability (Switzerland)*, 11(8). <https://doi.org/10.3390/su11082296>
- Rodrigues, A. P., Vieira, I., Fernandes, D., & Sousa, N. (2024). The Role of Public Trust in Fostering Residents' Support for Tourism Development: Evidence from a Portuguese Historic Town. In M. H. Bilgin, H. Danis, E. Demir, E. Aykac Alp, & S. Çankaya (Eds.), *Eurasian Business and Economics Perspectives* (pp. 267–281). Springer Nature Switzerland.
- Rodrigues, R., Estêvão, J. V., & Palrão, T. (2023). O overtourism é inimigo das comunidades anfitriãs? A influência das características geodemográficas dos residentes na sua perceção em relação ao turismo. *RPER*, 64, 27–46. <https://doi.org/10.59072/rper.vi64.269>
- Romagosa, F. (2020). The COVID-19 crisis: Opportunities for sustainable and proximity tourism. In *Tourism Geographies* (Vol. 22, Issue 3). <https://doi.org/10.1080/14616688.2020.1763447>
- Romero, A. B., Salom, M. B., Tipper, M. M., & Fletcher, R. (2019). Not tourism-phobia but urban-philia: Understanding stakeholders' perceptions of urban touristification. *BAGE. Boletín de La Asociación Española de Geografía*, 83, 3. <https://doi.org/10.21138/bage.2834>
- Ross, G. F. (1992). Resident perceptions of the impact of tourism on an Australian city. *Journal of Travel Research*, 30(3). <https://doi.org/10.1177/004728759203000302>
- Ruggieri, G., & Platania, M. (2024). Islands' tourism seasonality: A data analysis of Mediterranean islands' tourism comparing seasonality indicators (2008–2018). *Sustainability*, 16(9), 3674.
- Sánchez-Bayón, A., & Daumann, F. (2025). European tourism sustainability and the tourismphobia paradox: The case of the Canary Islands. *Sustainability*, 17(3), 1125. <https://doi.org/10.3390/su17031125>
- Scheyvens, R., & Russell, M. (2012). Tourism, Land Tenure and Poverty Alleviation in Fiji. *Tourism Geographies*, 14(1). <https://doi.org/10.1080/14616688.2011.593188>
- Scuttari, A., Della Lucia, M., & Martini, U. (2013). Integrated planning for sustainable tourism and mobility. A tourism traffic analysis in Italy's South Tyrol region. *Journal of Sustainable Tourism*, 21(4). <https://doi.org/10.1080/09669582.2013.786083>
- Šegota, T., Mihalič, T., & Kuščer, K. (2017). The impact of residents' informedness and involvement on their perceptions of tourism impacts: The case of Bled. *Journal of Destination Marketing and Management*, 6(3). <https://doi.org/10.1016/j.jdmm.2016.03.007>

- Seraphin, H., & Dosquet, F. (2020). Mountain tourism and second home tourism as post COVID-19 lockdown placebo? *Worldwide Hospitality and Tourism Themes*, 12(4). <https://doi.org/10.1108/WHATT-05-2020-0027>
- Sharma, B., & Gursoy, D. (2015). An examination of changes in residents' perceptions of tourism impacts over time: The impact of residents' socio-demographic characteristics. *Asia Pacific Journal of Tourism Research*, 20(12), 1332–1352. <https://doi.org/10.1080/10941665.2014.982665>
- Silva, M. G. e, Remoaldo, P., & Luíza Peluso, M. (2025). Human values and tourism perception: a new approach in residents' perceptions. *Current Issues in Tourism*, 28(3), 353–358. <https://doi.org/10.1080/13683500.2024.2331623>
- Thyne, M., Woosnam, K. M., Watkins, L., & Ribeiro, M. A. (2022). Social distance between residents and tourists explained by residents' attitudes concerning tourism. *Journal of Travel Research*, 61(1), 150–169
- Trave, C., Brunnschweiler, J., Sheaves, M., Diedrich, A., & Barnett, A. (2017). Are we killing them with kindness? Evaluation of sustainable marine wildlife tourism. *Biological Conservation*, 209, 211–222. <https://doi.org/10.1016/j.biocon.2017.02.020>
- Usher, L. E., & Kerstetter, D. (2014). Residents' perceptions of quality of life in a surf tourism destination: A case study of Las Salinas, Nicaragua. *Progress in Development Studies*, 14(4). <https://doi.org/10.1177/1464993414521525>
- Veríssimo, M., Moraes, M., Breda, Z., Guizi, A., & Costa, C. (2020). Overtourism and tourismphobia: A systematic literature review. *Tourism: An International Interdisciplinary Journal*, 68(2), 156–169. <https://doi.org/10.37741/t.68.2.4>
- Vij, A., & Walker, J. L. (2016). How, when and why integrated choice and latent variable models are latently useful. *Transportation Research Part B: Methodological*, 90. <https://doi.org/10.1016/j.trb.2016.04.021>
- Windarti, Y. (2019). Residents Perception of Impacts toward Tourism Development: The Case of Bandung City, Indonesia. *Journal of Tourism Management Research*, 6(1). <https://doi.org/10.18488/journal.31.2019.61.29.44>
- Wolf, F., Moncada, S., Surroop, D., Shah, K. U., Raghoo, P., Scherle, N., Reiser, D., Telesford, J. N., . Roberts, S., Havea, P. H., et al. (2024). Small island developing states, tourism and climate change. *Journal of Sustainable Tourism*, 32(9):1965–1983.
- Woo, E., Uysal, M., & Sirgy, M. J. (2018). Tourism Impact and Stakeholders' Quality of Life. *Journal of Hospitality and Tourism Research*, 42(2). <https://doi.org/10.1177/1096348016654971>
- Żemła, M. (2020). Reasons and consequences of overtourism in contemporary cities—Knowledge gaps and future research. *Sustainability*, 12(5), 1729. <https://doi.org/10.3390/su12051729>
- Zhang, A., Zhong, L., Xu, Y., Wang, H., & Dang, L. (2015). Tourists' perception of haze pollution and the potential impacts on travel: Reshaping the features of tourism seasonality in Beijing, China. *Sustainability (Switzerland)*, 7(3), 2397–2414. <https://doi.org/10.3390/su7032397>

Zhang, K., Hou, Y., Li, G., & Huang, Y. (2020). Tourists and Air Pollution: How and Why Air Pollution Magnifies Tourists' Suspicion of Service Providers. *Journal of Travel Research*, 59(4). <https://doi.org/10.1177/0047287519859710>

Zhao, L., & Xia, X. (2020). Tourism and poverty reduction: Empirical evidence from China. *Tourism Economics*, 26(2). <https://doi.org/10.1177/1354816619863266>

Ethics declarations

Competing interests

The authors declare no competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

Ethical approval

All procedures conducted in this study adhered to the ethical standards outlined in the Declaration of Helsinki and the Regulation 1/2024 of the Research Ethics Committee of the University of Las Palmas de Gran Canaria (approval under code MAC2/3.5b/254 on June 12, 2019).

The authors further declare that the submitted manuscript is original, has not been published elsewhere, and fully complies with the Ethical Guidelines applicable to this journal.

Informed consent

In accordance with the Regulation 1/2024 of the Human Research Ethics Committee of the University of Las Palmas de Gran Canaria, approved by Agreement of the Governing Council of the University of Las Palmas de Gran Canaria on February 29, 2024 (BOULPGC of March 20, 2024 - Extraordinary), it is stipulated that i) participants' rights must be protected in the collection of data through surveys, interviews, or similar methods, and ii) informed consent must be obtained for the research.

As this study is non-interventional and low risky in nature, full written consent was not deemed necessary. Participants were clearly and fully informed about the purpose of the study, the use of anonymized and aggregated data for research purposes, and the publication of results in dedicated reports and academic journals. Each participant provided consent to take part in the study and access the questionnaire by selecting a checkbox during the online fieldwork conducted in October 2022.

Data availability statement

The survey of this study is openly accessible in the EU Open Research Repository, Indexed in OpenAIRE and citable with doi: <https://doi.org/10.5281/zenodo.17454889>

The dataset is available upon request to the corresponding author.

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