

Literature Review:

Solo Travel Research Conducted Using Computational Methods

Objective

Leisure travel is a multibillion-dollar industry with increasing number of people travelling consistently. A growing portion of people who are traveling without a companion are labelled as “solo travelers”. While marketers and tourism industry are gathering information about this phenomenon, extensive academic research has not been conducted in this growing trend. The goal of this research paper is to utilize computational tools and method to understand the motivation for solo travel. Specifically focusing on determining whether a solo traveler is seeking solitude and lone relaxation time or is predominantly seeking to meet new people? To gauge the existing scholarly works related to this question, an in-depth literature review is conducted. Owing to the breadth of topics concerning this research question, the literature review is divided into three main parts: travel research and sociology of travel, research specific to solo travel, and travel research that uses computational methods.

Travel Research and Sociology of Travel

Andrei P. Kirilenko and Svetlana Stepchenkov give an overview of the existing travel research in a publication, “Tourism Research from its Inception to Present Day: Subject area, Geography, and Gender Distributions.” In this paper, the authors use Latent Dirichlet Allocation (LDA) text mining approach on abstracts from three top ranking journals to determine trends in tourism research subject matter as well as the location and gender of travel researchers. The key findings indicate that currently, the top subjects of research are “Tourism as a Social Phenomenon” and “Tourist

Experience and Motivation”, most researchers are from the United States followed by United Kingdom and that the percentage of male scholars researching travel has declined over time (Kirilenko et al). This resource is a good starting point for current travel research review to know the most researched topics. Additionally, a computational method can be similarly utilized even on a different corpus of data. Much of travel research is focused on understanding the consumptive pattern of tourists and the impact of travel. While some journals focus on the social science implication of travel patterns, many of them just focus on the topics and trends in tourism management. To understand the sociological perspective on travel, the works of Erik Cohen, from Hebrew University’s Department of Sociology and Social Anthropology, proved valuable. From 1984 Annual Review of Social Article, “The Sociology of Tourism: Approaches, Issues and Findings” to the 2019 publication written in conjunction with Scott Cohen “New Directions in the Sociology of Tourism”, his work helps ground the sociological underpinnings in tourism research. Cohen and Cohen state that sociology of tourism was primarily concerned with “study of authenticity and tourist gaze [set of expectations that tourists have about the people and places experienced during leisure travel]” but it now embraces additional intellectual topics (Cohen et al 15). This includes discussion on emotions, sensory experience, materialities, gender, ethics, authentication and even philosophical grounding of tourism theory. Within each topic, the authors use narrative discussion approach to highlight how novel theories from other fields are being incorporated in tourism research. It creates an imperative to expand solo travel research from “solely in terms of economic activity” to a framework that includes emotions of belonging and longing to add a new dynamic to how this topic has been typically addressed (Cohen et al, 6).

Solo Travel Research Literature

Owing to only recent increase and popularization of solo travel, there is relatively low scholarly work focused specifically on solo travel. Constanza Bianchi's paper, "Solo Holiday Travellers: Motivators and Drivers of Satisfaction and Dissatisfaction" is one that explicitly addresses why people travel alone and primarily focuses on what causes satisfaction or dissatisfaction to solo travelers. The author distinguishes that whether one is travelling in a group or alone some of the motivations may be the same including desire to relax, "curious hedonism", prestige, or destination's appeal regards to attractions and natural scenery, but different aspects will have different priorities for solo travelers. Additionally, Bianchi brings to attention that most research on solo travel is gender specific and provides insight into why women solo travel but not necessarily represent the entire population:

Nevertheless, most knowledge on solo travellers is generated from the perspective of gender-related studies (Wilson, 2004; Chiang & Jongaratnam, 2006; Wilson & Little, 2008) or from a tourism-type approach (mainly adventure or backpacking tourism). This research suggests that women's motivation for travelling alone relates to their desire to challenge themselves, find a sense of autonomy and self-determination, meet new people and/or extend themselves out of their comfort zone (Jordan & Gibson, 2005; Chiang & Jongaratnam, 2006; Wilson & Little, 2005, 2008; McNamara & Prideaux, 2010). (Bianchi 199)

In this study, Bianchi uses qualitative research methodology, Critical Incident Technique (CIT) on information gathered from face to face conversation with 24 participants from Queensland, Australia to learn about the experiences of solo travelers. The study found that top three main drivers were "personal factors (37% of incidents), followed by destination factors (35% of incidents) and human interaction factors (28% of incidents)" (Bianchi 202). Where personal factors include feeling of bravery, sense of achievement etc., destination factor includes historical sites ,

landscapes, restaurants, etc. and human interaction includes both service providers and local people or travelers. The emphasis on human interaction is telling of the human social need and its role in the motivation to travel. The authors acknowledge that a major limitation in this study is the small number of participants from one region of the world. This limitation can be overcome by using computational methodology and using data from a wide population sample.

Survey on Methodology Literature

Methods in text mining and sentiment analysis will be the main tools to conduct the analysis on digitally curated tourism data. These methods are studied well and applied widely so the literature is widespread but for this literature review, the search was limited to computational methods in travel research. A recent paper, “Sentiment Analysis in Tourism: Capitalizing on Big Data” by authors Ali Reza Alaei, Susanne Becken and Bela Stantic assesses and reviews the performance on sentiment analysis on different datasets across travel research. Sentiment analysis can be instrumental in categorizing opinions or emotions which is critical in an industry driven by customer experience and satisfaction. The paper provides an overview of the technical details of sentiment analysis and then goes on to focus on different methods used in tourism literature on typical online tourism data – online reviews from professional sites or twitter data. After comparing a range of methods used, the authors find that machine learning approaches were used with annotated data consuming human resources, models were better at classifying positive sentences compared to negative or neutral ones, target specificity needs to be improved and the star ratings in online reviews can be helpful with the classification (Alaei et. al, 186). The ideas and methods discussed in this paper serve as a good guide in selecting the best research method for research, such as, solo travel research. Furthermore, it highlights the need to consider automated

analysis in the world of ever-increasing digital data that is not just enhancing the research methods but changing the how we approach the question itself – hypothesis driven versus data driven. Another work on text analysis on tourism data, “Tourism, travel and tweets: algorithmic text analysis methodologies in tourism”, is limited to twitter data. The focus of this paper was to confirm if twitter data is useful for sentiment mining for market research. The authors show that the use of twitter data, also referred here as “micro-blog”, is desirable as it is easier to collect than blog entries and short character length is advantageous in improving classification efficiency. They do so by conducting analysis in one dimension of positive to negative and Kohonen self-organising map (SOM) for multidimensions (Claster et. al, 86). The authors conclude that further work in reliability of sentiment analysis is warranted to fully utilize its capability in real time tourism analysis. This paper’s choice of computational methodology used on twitter data serves as a good example of how to effectively utilize the large dataset found on twitter for travel research. While it is evident that using computational methods would tremendously enhance tourism research, it is important to remember that many of techniques need to be fine tuned using subject matter expertise.

Conclusion

The findings of travel research have been applied to many marketing and tourist management ventures but makes “little contribution back to the more general discipline of sociology itself” (Cohen et. al 16). The research to understand the social phenomenon in solo travel by using large sets of digital data falls within a niche intersection of sociology, travel research and computational methods that is still maturing. To successfully capture the findings of past work and build a concrete basis for future analysis, it was important to get an understanding on all three parts.

References*

- Alaei, Ali Reza, et al. "Sentiment Analysis in Tourism: Capitalizing on Big Data." *Journal of Travel Research*, vol. 58, no. 2, 2017, pp. 175–191., doi:10.1177/0047287517747753.
- Banerjee, Snehasish, and Alton Y.k. Chua. "In Search of Patterns among Travellers Hotel Ratings in TripAdvisor." *Tourism Management*, vol. 53, 2016, pp. 125–131., doi:10.1016/j.tourman.2015.09.020.
- Banyai, Maria, and Troy D. Glover. "Evaluating Research Methods on Travel Blogs." *Journal of Travel Research*, vol. 51, no. 3, 2011, pp. 267–277., doi:10.1177/0047287511410323.
- Bianchi, Constanza. "Solo Holiday Travellers: Motivators and Drivers of Satisfaction and Dissatisfaction." *International Journal of Tourism Research*, vol. 18, no. 2, 2015, pp. 197–208., doi:10.1002/jtr.2049.
- Bosangit, Carmela, et al. "Using Travel Blogs to Examine the Postconsumption Behavior of Tourists." *Journal of Vacation Marketing*, vol. 18, no. 3, 2012, pp. 207–219., doi:10.1177/1356766712449367.
- Claster, William, et al. "Tourism, Travel and Tweets: Algorithmic Text Analysis Methodologies in Tourism." *Middle East J. of Management*, vol. 1, no. 1, 2013, p. 81., doi:10.1504/mejm.2013.054071.
- Cohen, Erik, and Scott A. Cohen. "Current Sociological Theories and Issues in Tourism." *Annals of Tourism Research*, vol. 39, no. 4, 2012, pp. 2177–2202., doi:10.1016/j.annals.2012.07.009.
- Cohen, Scott A., and Erik Cohen. "New Directions in the Sociology of Tourism." *Current Issues in Tourism*, vol. 22, no. 2, 2017, pp. 153–172., doi:10.1080/13683500.2017.1347151.

Kirilenko, Andrei P., and Svetlana Stepchenkova. "Tourism Research from Its Inception to Present Day: Subject Area, Geography, and Gender Distributions." *Plos One*, vol. 13, no. 11, 2018, doi:10.1371/journal.pone.0206820.

Stainton, Hayley, and Elitza Iordanova. "An Ethical Perspective for Researchers Using Travel Blog Analysis as a Method of Data Collection." *Methodological Innovations*, vol. 10, no. 3, 2017, p. 205979911774813., doi:10.1177/2059799117748136.

**Note: Some additional works that were not included in the review but were useful are also included here.*