Gaung Undergraduate Student Attitudes During a Short-Term Study Abroad Towards Upgrading or Downgrading Hotels to Facilitate Enhanced Travel Experiences

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Abstract: The global tourism and hospitality management industry has been expanding for decades, interrupted only by post-9/11 shutdowns and the 2020-2021 coronavirus pandemic. The literature in this field has evolved over the past several decades toward more nuanced travel research related to methods of seeking additional revenue from tourists once they have confirmed travel plans. One of these methods of maximizing intra-trip consumer spending is to capitalize on travelers’ willingness to upgrade their accommodations. The consumer behavior literature on tourism has focused on the various on-site experiences of travelers and the lead-up making such travel arrangements. Following this line of research, this study will assess travelers’ willingness to spend additional money during the trip via upgrading accommodation for various levels of hotels.

Keywords: hospitality management, student travel, short-term study abroad, travel pedagogy

Introduction & Literature Review

The global hospitality sector provided wages for 313 million jobs worldwide in 2017 (Kendall College, 2018), and 253 American colleges now offer hospitality management majors (College Factual, 2020). The number of positions in the travel industry nearly tripled between 2009 and 2018 (Deloitte, 2019) and 2018 was the 8th consecutive year of tourism growth, with 1.4 billion annual travelers (World Tourism Organization, 2020). While the ongoing pandemic will certainly spawn an abundance of literature discussing its impact on the tourism industry in 2020 and beyond, research dedicated to the field of global tourism and hospitality management has been active for decades. In particular, the literature on hospitality management has now gone beyond studies of economic impact to assessing how to persuade travelers to spend more on the trip. Tourism has become a central component of many economies, as cities and countries around the world are proactively marketing their locations for potential tourism revenue (Tribe, 2011; Vanhove, 2011; Matias et al., 2016; Kozak & Kozak, 2015; Delitheou & Papastamatiou, 2016; Meng & Siritwardana, 2016). By 2018, the tourism industry accounted for 3.2% of the global economy and was an integral component of many countries’ economies (WTTC, 2018) and 12 countries around the world had 15% or more of their national GNP dedicated to their global tourism and hospitality industries (Smith, 2018). With a vital amount of revenue to local economies being generated by the travel industry, the stakes are higher than ever.

Tourism experiences can dictate future consumer behavior behaviors such as the selection of accommodations. The global hotel industry uses a star ratings system in order to facilitate target marketing, so that travelers more easily understand the costs associated with various styles of hotels. While it is difficult to quantify the happiness of a traveler, it has been found that generally, the emotions of tourists are ultimately shaped by their experiences on-site in hotels, transportation, events, excursions, and so forth (Man-U, Mitas et al., 2012a; Su and Hsu, 2013b). In particular, hotels are an integral component of the tourism industry and have been studied to assess their impact on travel experiences and the local economy (Singh et al., 2006; Jones & Chen, 2011; Chang, 2014; Becker, 2016; Gao & Mattila, 2016; Wood, 2017; Mauer & Siller, 2019; Gao & Li, 2020). Even though travelers are utilizing the accommodation option of Airbnb’s more often, the hotel industry remains at the heart of tourism and hospitality (Floersh, 2017).

Hotels are constantly striving to upgrade their accommodations to provide the best possible consumer-driven assortment of amenities. These upgrades have the goals of obtaining more bookings while also providing the best possible experience for the traveler (Vila et al., 2012, Wood, 2017, Varian, 2018). Travel sites where potential travelers browse for hotels now routinely offer various hotel room options at different price levels to allow the
traveler to increase the likelihood of a booking (Camillo, 2015; James et al., 2017; Clayton, 2018). Hertzfeld (2019) called this process an investment in “revenue-management capabilities (p. 1). Today, hotel booking sites like Expedia and Travelocity commonly offer various options for travelers, not only in hopes of luring them to spend money as well as upgrades to their initial ideas (Clayton, 2018; Sousa et al., 2019), in order to secure the most consumer spending. In addition, hotels are researching strategies in attempts to contact and ultimately convince guests to upgrade their already-booked rooms before their stay (Vora, 2016; Wood, 2017; Allen, 2020). These strategies are constantly evolving, as it is “a longstanding practice of the industry that hotels...at their discretion, can offer guests a hotel room upgrade from a prior request” (Arneson, 2020, p. 1).

“Travelers like alternative accommodations for a reason” (Hertzfeld, 2019, p. 5). While many studies have described strategies related to upgrading hotel accommodations, research on whether and how downgrading hotel accommodations allows travelers more discretionary money while on the trips is still relatively new.

Because Study Abroad (SA) programs necessitate lodging for students, planning for these trips and the execution of travel arrangements is organized in advance. Innovations in hotel management have benefited these programs, as institutions of higher education have learned and benefited from general tourism and hospitality management pedagogy. In fact, the increasing popularity of short-term SAs (those lasting 4 weeks or less) tends to mirror the timeframes of vacationers and other global travelers, and short-term SAs have been more commonly offered in recent decades in order to increase the likelihood that students will be able to take part in a trip.

Barkley and Barkley (2013) reported that cultural encounters are an important ingredient of a short-term SA if administered appropriately, and other scholars have pointed out that students can adequately gain true intercultural awareness and insight from a suitably planned short-term SA (Chieffo and Griffiths, 2004; Martinsen, 2011; Vande Berg et al., 2012). During these planning stages, decisions about sites are structured and coordinated well in advance, including transportation, hotels, and excursions. Teichler and Steube (1991) found that the planned logistics of a SA trip will make or break students’ experiences.

While there have been numerous studies on the goals of travelers, the best way to structure a SA, and hotel accommodations target marketing, there have been none connecting these threads, such as the student consumer behavior reactions while on a SA and how their experiences in local hotels shape their experiences as tourists and/or future tourists through their willingness to spend more or less on their hotels.

**Methodology, Reactions, and Future Studies**

A predictive study is a type of experimental design which is utilized to ascertain when and in what situations an event will occur. In this case, the goal was to discover the willingness of a student on a short-term study abroad to pay more or less for the hotel for alternative accommodations on the trip. This study will attempt to test for a relational hypothesis or a causal hypothesis about how accommodations at hotels might prompt specific monetary reactions and/or intentions.

This study assessed the attitudes of 18 undergraduate students from a public higher education institution in the American Midwest (which is a member of the Association of American Colleges & Universities) during a 3-credit SA trip that took place over the course of 14 days in May 2019. All the students were majoring in a technology-related field. This trip covered four cities in three Central European countries, all of which were listed among the top 32 European cities for millennials to live in (Bloom, 2017). Students stayed in a hotel for three nights in each of the cities. One hotel had a 4-star rating (Munich), two hotels had a 3-star rating (Rotterdam and Hamburg), and one hotel had a 2-star rating (Prague).

Surveys were distributed (see appendix B) immediately after the stay in each hotel in order to determine how the hotel affected the students’ attitudes in an array of areas and so that their cognitive reactions would be assessed in relation to how they affect other variables. Seven survey questions were developed on a Likert-type scale in order to assess the hotels’ impact on student monetary reactions (see appendix B).

Answers to the questions were coded from -2 (worst) to +2 (best), with zero as a mean for all questions. One student filled out the forms incorrectly and was dropped from the sample set. The Kolmogorov-Smirnov Test was utilized for the test statistics (below) because it compares two distributions to assess if they show any
significant difference. For each test, a D-value (test statistic) is obtained, along with a p-value; if the p-value is significantly low (often said to be less than 0.05), it can be stated that the distributions appear to be significant. The first eight of these tests are intended to assess whether the rate or responses to the seven questions have a normal (bell-shaped) curve. This analysis found that none of these distributions were normally distributed.

Table 1. Test Statistics for Responses to Seven Questions

<table>
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<tr>
<th>Treatment</th>
<th>D Value</th>
<th>p-value</th>
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<td>&lt;0.05</td>
</tr>
<tr>
<td>Q2</td>
<td>0.96162</td>
<td>&lt;0.05</td>
</tr>
<tr>
<td>Q3</td>
<td>0.84134</td>
<td>&lt;0.05</td>
</tr>
<tr>
<td>Q4</td>
<td>0.86787</td>
<td>&lt;0.05</td>
</tr>
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<td>Q5</td>
<td>0.84134</td>
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</tr>
<tr>
<td>Q6</td>
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</tr>
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</tr>
<tr>
<td>Rate</td>
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<td>&lt;0.05</td>
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</tbody>
</table>

The null hypothesis of the linear-by-linear test for ordered contingency tables states that there is no association among the variables. In this test, if the p-value of the test is less than 0.05, a conclusion can be drawn that there is an association between two variables, as was the case for these survey questions (see below), whereas the double-sided arrow indicates an association between the two variables at both ends of the arrow.

Figure 1. Associated Questions Based on the Star-levels

As such, it was determined that the star-level of the hotel was associated with Q3, Q5, and Q7 of the survey. Additionally, associations of questions were determined for hotel star-level. For instance, associations were determined to be between Q1 and Q2 for all individual hotels (see figures below), which is not surprising because both of those questions focused on student views toward the city. Further, an association between Q3 and Q6 was determined, but only for the 3-star hotels. In addition, there are more associations among the responses for the 3-star hotels rather than the 2-star hotels and 4-star hotels (see below).

Figure 2. Associated Questions for the Munich hotel
The Friedman test is a non-parametric analysis used to detect differences resulting from repetitions of a particular experiment, and only requires a minimum of 5 in the sample set, so its experimental expectations were met within this study. The style is a replicated complete block design, and in this approach, one variable serves as group variable whereas another variable serves as the blocking variable (in this case, each of the students). In this analysis, the answers for each question were compared as they related to the 4 hotels, and significance was determined by a p-value of .005 (using a 95% confidence level with a Bonferroni adjustment). The null hypothesis tested was that there is not any significant difference among four hotels. Because of the high correlation between Q3 and Q4 and Q5 and Q6, a given condition was added, in order to show that the model only needs to account for one of these variables. For example, in Q4, the p-value is significant, but it is less significant than Q3 and does not show any difference when Q3 is accounted for. The group wise medians and confidence intervals indicated that the medians have 95 percent chance to fall into the confidence intervals.

### Table 2. Friedman Test Output

<table>
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<tr>
<th>Subject</th>
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<th>p-value</th>
</tr>
</thead>
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<td>0.008021</td>
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<tr>
<td>Q2</td>
<td>2.7581</td>
<td>0.4304</td>
</tr>
<tr>
<td>Q3</td>
<td>24.951</td>
<td>&lt;&lt;0.05</td>
</tr>
<tr>
<td>Q4</td>
<td>15.744</td>
<td>0.001279</td>
</tr>
<tr>
<td>Q4 given Q3</td>
<td>6.5357</td>
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<tr>
<td>Q5</td>
<td>8.7176</td>
<td>0.03329</td>
</tr>
<tr>
<td>Q6</td>
<td>10.159</td>
<td>0.01726</td>
</tr>
<tr>
<td>Q5 given Q6</td>
<td>2.5556</td>
<td>0.4653</td>
</tr>
<tr>
<td>Q7</td>
<td>24.813</td>
<td>&lt;&lt;0.005</td>
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</table>

As seen in the table above, student ratings for Q3, Q4, and Q7 all show significance in those responses, whereas Q3 and Q4 have a large central value. However, as seen above, Q4 (money to downgrade) is less significant than Q3 (money to upgrade). Q6 does show a level close to significance, so it could be utilized as a further method of analysis, whereas Q5 does not appear to have significance. Thus, the best questions to use for this study, based on...
the Friedman test, are Q3 and Q7. Since this particular study is focused on the likelihood of a student upgrading or downgrading the hotel room, Q3 will be utilized because the questions related to consumer spending included Q3-Q6. The linear-by-linear test for ordered contingency tables confirmed that there was a strong association among all the hotels for Q3.

In general, most students felt that the accommodations in the four different cities improved their traveling experiences in the city and also increased their likelihood of coming back again. These patterns may indicate that the difference in hotels ratings do not necessarily affect the students’ mood when staying in the city and the likelihood of coming back again.

In regard to the desire to upgrade or downgrade accommodations (Q3 to Q6, the focus of this study), not many were willing to pay or receive more than 50% of a weekly paycheck to upgrade or downgrade the accommodations (the only responses indicating a willingness to pay or receive more than 50% of a weekly paycheck in the affirmative were the 12.5% willing to offer more than 50% to upgrade for the 2-star hotel). 31.2% were willing to pay more than 10% of a weekly paycheck, and 50% are willing to pay more than 25% of a weekly paycheck to upgrade an accommodation from a 2-star hotel. 43.5% are willing to pay less than 10% of a paycheck and 18.8% are willing to provide more than 10% of a paycheck to upgrade an accommodation from a 4-star hotel. One-fourth of students said they were not willing to pay or be paid any money to either upgrade or downgrade the accommodations for Q3, Q4, Q5, and Q6. 25% of students said that they were willing to give a more than 10% of a weekly paycheck to downgrade their accommodations for a future visit to the city, and 19% of students said they were willing to give more than 10% of a weekly paycheck to upgrade their accommodations for their future visit to the city. Few students were willing to pay or to receive more than 25% or 50% of a weekly paycheck to upgrade or downgrade their accommodations for a future visit in Munich.

Interestingly, the percentage responses to the questions were the exact same for the two hotels with a star-level of three, including (Q3) where 50% for each hotel responded that they would be willing to spend less than 10% of a paycheck for an upgrade, as well as (Q4), where 62.5% for each hotel deciding on “none” for their willingness to either upgrade or downgrade. Since half of the students were willing to pay less than 10% of a weekly paycheck to upgrade a 3-star hotel, future studies may assess which specific accommodations and/or aspects of 3-star hotels students would be willing to upgrade. However, it should be noted that the vast majority were content with their accommodations for a 3-star hotel.

In addition, the strong associations between the survey questions for both 3-star hotels from the linear-by-linear test for ordered contingency tables, specifically Q3 and Q6, may be indicative of further analysis, and would especially be a worthy focus for hotels researching their “revenue-management capabilities”, which Hertzfeld (2019) stated are constantly being assessed for future investment purposes. Further, the consistency of ratings for the 3-star hotels, as well as the strong associations between questions, is evidence of additional warranted analysis. Since the Friedman test identified Q3 as having the most significance, Q3 for the 3-star hotels should be a focus for subsequent inquiry.

Future researchers might also analyze a larger sample set of travelers and should be willing to compare students on a SA versus more general travelers. A similar study on retirees and their travel patterns would be also encouraged, since this demographic has different needs. Subsequent analysis may additionally focus on if traveler responses differ depending on if the traveler has a work versus leisure trip. Future SAs may examine if accommodations lower than a 2-star rating (such as a hostel) have a stronger negative impact on student moods.

Also, since the vast majority of students were not willing to downgrade from a 2-star hotel, but a majority were willing to pay more than 10% or 25% of a weekly paycheck, further analysis might inquire what amenities would be most important in a 2-star hotel that a SA student would be inclined to upgrade. Further hotel investment research related to their revenue-management capabilities should focus on how to entice travelers to upgrade from a 2-star hotel using 10-25% of a typical weekly paycheck, as well as how to entice travelers to upgrade from a 3-star hotel using less than 10% of a paycheck. As noted, for 3-star hotels, since students would be willing to give up less than 10% of a weekly paycheck for changes, key focus on revenue-management capabilities should focus most on Q3 and areas to enhance travel experiences.
References:


### Appendix A.

**Seven Questions**

1. How much did the accommodations affect your likelihood of coming to the city again?
2. How much did the accommodations affect your likelihood of living and/or working in this city in the future?
3. What amount of money that you would be willing to pay to upgrade your accommodations if you took a trip to this city in the future?
4. What amount of money that you would be willing to be given to downgrade your accommodations if you took a trip to this city in the future?
5. What amount of money that you would be willing to pay to upgrade your accommodations for this trip?
6. What amount of money that you would be willing to be given to downgrade your accommodations for this trip?
7. How did the accommodations affect your mood in this city?

### Appendix B.

**Hotel Survey**

**Student number:**

**Q1:** How much did the accommodations affect your likelihood of coming to the city again?

- No difference
- More likely to visit
- Much more likely to visit
- Less likely to visit
- Much less likely to visit

**Q2:** How much did the accommodations affect your likelihood of living and/or working in this city in the future?
Q3: What amount of money that you would be willing to pay to upgrade your accommodations if you took a trip to this city in the future?

None ____
Less than 10% of a weekly paycheck ____
More than 10% of a weekly paycheck ____
More than 25% of a weekly paycheck ____
More than 50% of a weekly paycheck ____

Q4: What amount of money that you would be willing to be given to downgrade your accommodations if you took a trip to this city in the future?

None ____
Less than 10% of a weekly paycheck ____
More than 10% of a weekly paycheck ____
More than 25% of a weekly paycheck ____
More than 50% of a weekly paycheck ____

Q5: What amount of money that you would be willing to pay to upgrade your accommodations on this trip?

None ____
Less than 10% of a weekly paycheck ____
More than 10% of a weekly paycheck ____
More than 25% of a weekly paycheck ____
More than 50% of a weekly paycheck ____

Q6: What amount of money that you would be willing to be given to downgrade your accommodations on this trip?

None ____
Less than 10% of a weekly paycheck ____
More than 10% of a weekly paycheck ____
More than 25% of a weekly paycheck ____
More than 50% of a weekly paycheck ____

Q7: How did the accommodations affect your mood in this city?

No difference ____
More happy ____
Much more happy ____
Less happy ____
Much less happy ____
Appendix C.

The Mean of the Seven Questions

Appendix D.

Heat Charts for Q1-7

Munich

Prague

For H

For R
Appendix E.

Distribution Percentage Charts for Q3-6 (In order of Munich, Prague, Hamburg, Rotterdam)
Appendix F.

The Confidence Intervals for Medians

<table>
<thead>
<tr>
<th>Rate</th>
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Q1
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Q2
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Q3
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Q4
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Q6
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Q7
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Appendix G.

Graphs for Q3-Q6

Appendix H.

Difference in Likert for Q3-Q6