

The Abolition of the Roaming Charges and its Effect on Tourist's Experience

Bachelor Thesis for Obtaining the Degree
Bachelor of Business Administration in
Tourism and Hospitality Management

Submitted to Yuliya Kolomoyets

Nadine Feigl

1711020

Vienna, 24.06.2020

Affidavit

I hereby affirm that this Bachelor's Thesis represents my own written work and that I have used no sources and aids other than those indicated. All passages quoted from publications or paraphrased from these sources are properly cited and attributed.

The thesis was not submitted in the same or in a substantially similar version, not even partially, to another examination board and was not published elsewhere.

24.06.2020

Date

Abstract

Tourists aim for rich and memorable experiences. Nowadays, these experiences are influenced by the increasing use of technologies, like smartphones, that are changing the way tourists plan, navigate, and perceive their experiences. The costs associated with the use of smartphones by those traveling abroad are identified as a key barrier for the broader adoption of the technology. In 2017 the EU has announced the abolition of the roaming charges for European sim-card holders traveling to other EU member countries. As a result, tourists are now able to use their mobile phone on-site without having additional costs. Given the novelty of the regulation, there is a lack of research regarding the effect of the roaming regulation on tourist experiences. This bachelor thesis addresses the identified gap and employs qualitative methodology, namely in-depth interviews, to explore mobile usage patterns and on-site experiences among tourists traveling to the international destination free from roaming charges.

The results reveal that the tourist's experiences are influenced by activities that spill over from everyday life mobile phone usage. Besides, results suggest that access to unlimited mobile phone services makes traveling less stressful and enable tourists to feel safer when creating memories at a destination.

Table of Content

AFFIDAVIT	2
ABSTRACT	3
TABLE OF CONTENT	4
LIST OF TABLE	5
LIST OF FIGURES	5
LIST OF ABBREVIATIONS	6
INTRODUCTION	7
1 LITERATURE REVIEW	9
1.1 Tourists Experience.....	9
1.1.1 Defining Tourists Experience.....	9
1.1.2 Components of Experiences.....	11
1.1.3 Analyzing Tourists Experiences.....	13
1.2 Technology’s and their Effect on Tourist On-Sight Experience.....	16
1.2.1 Mobile Technologies.....	21
1.3 International Roaming in the European Union.....	24
2 METHODOLOGY	27
2.1 Research Design.....	27
2.2 Sampling.....	29
2.3 Interview Guide and Questions	30
2.4 Data Collection and Analysis.....	34

3	FINDINGS & DISCUSSION.....	36
3.1	Change of Mobile Phone Usage patter for travels in the EU	37
3.2	EU Roaming Regulations, Mobile Phone Usage and their Influence on Tourist On-site Experience	42
4	CONCLUSION.....	47
	LIMITATION AND RECOMMENDATION	49
	REFERENCES	50
	APPENDICES.....	58

List of Table

<i>Table 1: Research Questions.....</i>	<i>8</i>
<i>Table 2: Activities in the Pre-trip, On-site, and Post-trip phase.....</i>	<i>13</i>
<i>Table 3: Dimensions of Customer Experience</i>	<i>14</i>
<i>Table 4: Interview Questions.....</i>	<i>34</i>
<i>Table 5: Demographic Profile of Informants</i>	<i>35</i>

List of Figures

<i>Figure 1: Five Phase Tourist Experience</i>	<i>11</i>
<i>Figure 2: Three Phase Tourist Experience</i>	<i>12</i>
<i>Figure 3: Technology Enhanced Tourism Experiences.....</i>	<i>17</i>
<i>Figure 4: Preference of Online or Offline Hotel Booking in the U.S 2017.....</i>	<i>19</i>
<i>Figure 5: Worldwide Digital Population as of April 2020</i>	<i>20</i>
<i>Figure 6: Reasons of Smartphone Usage While Traveling.....</i>	<i>37</i>

List of Abbreviations

App - Mobile Applications

EC – European Commission

COVID-19 – Coronavirus Disease 2019

EU - European union

et al. – et alia ("and others")

ITC - Information Communication Technology

OTA - Online Travel Agencies

RQ – Research Question

RLAH – Roam Like at Home

SMS – Short Message Service

Introduction

Nowadays, technological development and global competition provide consumers with a variety of products and services to choose from. In this abundance of choice, consumers are not merely looking for satisfying the product-related needs, but increasingly demand experiences from product and service providers. In this reality, to attain a competitive advantage and ensure customer satisfaction, it is essential for service providers to understand how their customers perceive their travel experience (Pine and Gilmore, 1998).

Due to developments and integration of technologies, especially smartphones, by consumers and suppliers, tourists' experiences are undergoing extensive changes (Wang, Park & Fresenmainer, 2012). Research from the online travel agency (OTA) Expedia shows a massive trend in mobile phone usage for travel-related activities (Expedia, 2014). The research reveals that an impressive 76% of travelers have indicated that their smartphone plays an important role in their lives (Expedia, 2014). Extant research demonstrates a substantial influence the use of smartphones has on the way people travel and perceive their experiences (Kramer et al. 2007; Kim, Park, and Morrison 2008; Paris 2012; Rasinger, Fuchs, Beers, and Hopken 2009; Tussyadiah and Zach 2012; Wang, Park, and Fesenmaier 2012 cited in Wang, Xiang & Fesenmaier, 2016). At the same time, exploration of the full potential and further integration of the smartphones in the travel sector is hindered by multiple factors, like technology readiness and privacy concerns of the tourists (González-Reverté, Díaz-Luque, Gomis-López & Morales-Pérez, 2018), as well as the costs associated with the use of the mobile connection for the international tourists – roaming charges (Spruytte, Van der Wee, de Regt, Verbrugge & Colle, 2017) To date only limited research explores the role of roaming fees in the smartphone use and the tourist experience (Spruytte et al., 2017, Bourke, 2017, European

Commission, 2017, Klugman, 2017, Infante & Vallejo, 2012, Gerpott & Ahmadi, 2015, Sutherland, 2001).

In 2017 EU has announced the abolition of roaming charges for the mobile users within the EU (Spruytte et al., 2017). These changes in EU mobile roaming regulations facilitated the connectivity of those traveling across Europe. However, not a lot of information can be found on how these changes impacted traveler’s smartphone use and their experiences. In order to bring some light into the identified research gap, the author aims to reveal changes in travel patterns and changes in experiences of European Union sim-card holders traveling to counties that are European Union members. Therefore, this bachelor thesis intends to gain insights about the change of experiences by answering the following research questions (RQ):

RQ1: How did mobile usage patterns change after the abolition of the roaming charges in the EU?
RQ2: How did the abolition of the roaming charges in the EU influence tourist on-site experience?

Table 1: Research Questions

In order to answer these RQ, this thesis will review the academic literature of tourist’s experiences and technologies that have an impact on it. Further, it will touch on the past and current roaming regulations. To gain further knowledge this thesis employs a qualitative research method by conducting intensive in-depth interviews.

1 Literature Review

1.1 Tourists Experience

Over the years, customer experience has gotten more and more important and plays an increasingly essential role in the tourism industry today (Quan & Wang, 2004). The reason for that could be the increasing demand for experience from tourists (Pine and Gilmore, 1999 cited in Atembe & Akbar, 2014). Nowadays, tourism products and services can easily be replicated or interchanged which leads tourists to call for exclusive noteworthy experiences (Morgan, Lugosi & Ritchie, 2010).

In the last 50 years studying the topic of tourists' experiences has become quite popular and therefore, a lot of information and insights can be found in the academic literature (Quan & Wang, 2004). It can even be claimed that the tourism industry is a pioneer when it comes to providing outstanding customer experience (Quan & Wang, 2004). Researchers have engaged with experience-based research to get deeper insights and make tourists experience understandable (Andereck, Bricker, Kerstetter & Nickerson, 2006). The following paragraphs are aimed to review and reflect on tourist's experience in the academic literature.

1.1.1 Defining Tourists Experience

Defining an experience is difficult. Researchers don't agree on one definition for an experience. Therefore, definitions differ from study to study. The noun experience can be used to describe an action like participating in an activity, an outcome like emotions a person has while traveling or entertainment (Hosany & Gilbert, 2010). The verb experience refers to a person undergoing an emotional sensation of being in a particular state of mind (Ek, Larsen, Hornskov, & Mansfeldt, 2008 cited in Stienmetz, Kim, Xiang, & Fesenmaier, 2020). Highmore (2002 cited in Culter & Carmichael, 2010) explains that the word

“experience” can describe two dissimilar states: on the one hand the experience that refers to ongoing perceptions and feelings and direct observation (refers to the present) and on the other hand the experience which describes the knowledge and accumulated experiences over time (refers to the past). In the German language, the two states are described as “Erlebnis” and “Erfahrung” (Highmore 2002, cited in Culter & Carmichael, 2010). The researchers Svabo, Larsen, Haldrup, and Bærenholdt (2013, p. 316) define an experience as “a process where people undergo the influence of things, environments, situations and events, and a wide range of materials play active roles as mediators of experience”.

In academic tourism literature, many definitions are found for the term “tourist experience” and “tourism experience”. Both of these terms are used frequently and differ from each other slightly (Zátori, 2013). Since the term tourism experience is rather used in an organizational context this research will discuss only the definitions of tourist’s experiences which are focused on consumer perspectives (Zátori, 2013).

Tung and Ritchie (2011, p.1369) definition tourists experience as

“an individual’s subjective evaluation and undergoing (i.e. affective, cognitive and behavioral) of events related to his/her tourist activities which begin before (i.e. planning and preparation), during (i.e. at the destination), and after the trip (i.e. recollection)”.

Tourist's goal is to seek the perfect experience. The researcher's Pine and Gilmore (1998) state that not every activity and scenario is experienced by different individuals the same which leads to the conclusion that tourists' experiences are quite subjective. In addition, experiences can only be analyzed by including the individual that is taking part in the experience (Jennings, 2006 cited in Cutler & Carmichael, 2010). Furthermore, it is argued that tourists experience

differs from the experience of daily life (Cohen, 1979, 2004, Graburn, 2001; Vogt, 1976 cited in Cutler & Carmichael, 2010). The reason for that is the complex nature of tourist experiences which cause emotions and memories connected to places (Noy, 2007 cited in Cutler & Carmichael, 2010).

1.1.2 Components of Experiences

Many researchers agree on the fact that tourism experience is not made up of just one event. It is a process in which travelers are able to make important experiences (Gretzel, Fesenmaier, & O'Leary, 2006; Kim & Fesenmaier, 2017 cited in Stienmetz et al., 2020). In addition, the tourist experience does not begin and end at the destination. It starts before arriving and ends in the recollecting and planning of future trip phase (Pine & Gilmore, 1999 cited in da Costa Mendes, Oom do Valle, Guerreiro, & Silva, 2010).

Clawson (1963) describes the experience as a linear process divided into five stages: the “planning”, “travel to”, “on-site activities”, “the return travel” and the “recollection” phase (Figure 1). In Clawson's view, tourist experience has a clear start and endpoint (Clawson, 1963).

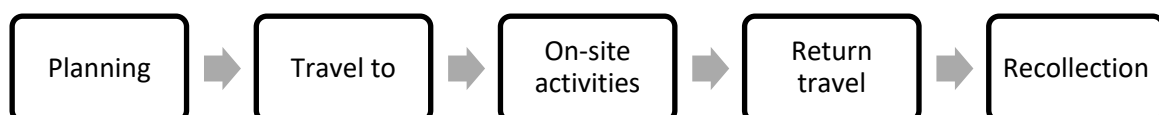


Figure 1: Five Phase Tourist Experience

(Clawson, 1963)

In between tourists engage in various activities: “They noted: (1) an anticipation or pre-purchase, (2) travel to the site segment (3) an on-site experience, (4) a return travel component, and (5) an extended recall and recollection stage” (Pearce, 2005, p.9). Building upon Clawson’s model, Craig-Smith and French (cited in Jennings, 2006) use a more simplified model to describe tourist's experience. The linear model shows three phases:

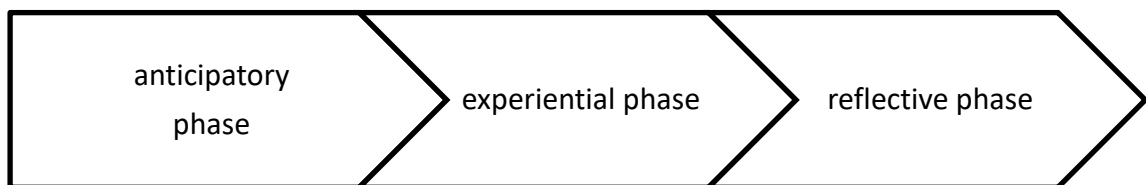


Figure 2: Three Phase Tourist Experience

(Craig-Smith and French, 1994 cited in Jennings 2006)

However, one of the most common and frequently used divisions of tourist experience’s is the three travel phases: Pre-trip, On-site, and Post-trip (Jung & Cho, 2015, Jani & Nguni, 2016, Dickson & Hall, 2006 Tsang, Chan & Ho, 2011).

Table 1 illustrates activities and tasks which are included in the pre-trip, on-site, and post-trip phase.

Travel Experience		
Pre – Trip	On-site	Post- trip
<ul style="list-style-type: none"> • Planning • Expectation • Formation • Decision-making • Transactions • Anticipation 	<ul style="list-style-type: none"> • Connection • Navigation • Short-term decision-making • On-site transactions 	<ul style="list-style-type: none"> • Sharing • Documentation • External memory • Re-experiencing Attachment

Table 2: Activities in the Pre-trip, On-site, and Post-trip phase

(Gretzel, Fesenmaier & O’leary, 2006, p.8)

As this thesis is aimed to find changes in mobile phone patter and experience of travelers at the destination mainly on-site related literature will be reviewed.

1.1.3 Analyzing Tourists Experiences

Customer experiences can be analyzed from different perspectives. One way is to examine experiences from a temporal perspective by, for example, using the customer journey map. This tool helps to identify different components of the experience which can also be called stops (Lemon & Verhoef, 2016; O’Neal, 2016; Schmitt, 1999, 2003 cited in Zacks and Tversky, 2001, p.21 cited in Stienmetz et al., 2020). One important feature of the customer journey map is that it can help to identify customer's interactions with a company which is called touchpoints (Lemon & Verhoef, 2016 cited in Stienmetz et al., 2020).

These touchpoints can happen through various types of face-to-face or virtual channels or media that are used in the planning, purchasing, and reflecting phase of the trip (Lemon & Verhoef, 2016 cited in Stienmetz et al., 2020). Emphasis on customer-provider interactions implies that experiences are co-created rather than offered by the service provider alone (Stienmetz et al., 2020).

Experiences include traveler's "cognitive, emotional, social, and physical responses" to a company (Verhoef, Lemon, Parasuraman, Roggeveen, Tsiros & Schlesinger, 2009). The marketing researcher Schmitt (1999) distinguishes between five levels of experience. Tourists experience can be divided into the following dimensions:

Levels/ Dimensions of Customer Experience	
Sensory	Sense
Cognitive	Thoughts
Emotional	Feelings
Behavioral	Act
Relational	social, culture

Table 3: Dimensions of Customer Experience

(Schmitt, 1999, Nasermoadeli, Ling, & Maghnati, 2013 & Kim, Chua, Lee, Boo & Han, 2016)

The following paragraph will give a brief review of each dimension.

Sensory refers to the five human senses a person will use while being at a destination. These include touch, smell, taste, sight, and sound. All these senses play a big role in the tourist's experience (Hulten, Broweus, and Dijk, 2009 cited in Nasermoadeli et al., 2013). These sensations can be enabling and triggering emotions (Dițoiu, Stăncioiu, Brătucu, Onișor, & Botoș, 2014), actions, thoughts and relational actions (Nasermoadeli et al., 2013).

Secondly, emotions are always part of an experience and are therefore important to understand (Prasad, 2013). The researcher Schmitt (1999) describes the emotional experience as the emotions, feelings & moods that are generated by a person during their trip. Emotions can be interpretations or evaluations of an event that are summed up into an experience (Roseman, Spindel & Jose 1990 cited in Hosany, 2012). The emotional response to a specific event differs from person to person. The cognitive levels describe the thoughts, beliefs, or perceptions that tourist forms of an event. (Fiore & Kim, 2007 cited in Kim et al., 2016). The fourth level, behavioral dimensions describes an action or practice (Haviř, 2017). Tourist's behavior can be described as the behavior and plans of tourists (March & Woodside, 2005). It includes tourists spending behavior, the length of stay, attractions, and destinations visited, and accommodations and activities are chosen (March & Woodside, 2005). The behavior and attitudes that tourists have prior, during, and afterward their travel refers to travel behavior (Van Vuuren & Slabbert, 2012). The relational dimension refers to the social context of the experience. It includes cultural and relationships that influence the experience (Haviř, 2017).

Finally, an interesting approach is to analyze the lifecycle phases of the experience: peak, end, mundane (supporting) experience. To further analyze experiences, the researcher Quan and Wang (2004) divide the tourist experience into two dimensions: the "peak" and "supporting" experience. The peak can also be seen as the most effective part of the experience (Larsen, 2007). To evaluate a tourist experience it is important to also take a look at the end experience. This part of the experience is seen as critical due to it being the last event which usually sticks in people's memory (Larsen, 2007).

1.2 Technology's and their Effect on Tourist On-Sight Experience

Information communication technologies (ICT) are changing experiences. In recent years technology has evolved and has become more affordable and therefore easier accessible to consumers (Lalicic & Weismayer, 2016). The term ICTs describes a wide range of technologies that allow users to interact with each other digitally (Buhalis, 2003). ICTs also plays an essential role in the tourism field and are known for impacting tourist's experience (Lis, 2008, cited in Atembe & Akbar, 2014). According to the scholars, Pine II & Korn (2011, p.6) ICTs can be described as “the technology of experiences”. Research from Lalicic and Weismayer (2016) shows, that the increasing number of consumers rely on technologies in their daily lives as well as in travel experiences (Lalicic & Weismayer, 2016). The following review of the literature shows that this is also the case in the tourism & hospitality field.

Tourism is an information-intensive industry. Hence it has been affected enormously by the recent technological developments (Werthner & Klein, 1999). According to Sheldon (1997), the tourism industry has continually been a leader in integrating technology. Research of Werthner & Klein (1999) shows that the information technologies increased the flexibility, quality, and efficiency of travel services supplied. The integration of technologies not just changed the creating process of tourism products and services but also changed the way tourists consume and experience them (Stamboulis & Skayannis, 2003 cited in Neuhofer, Buhalis & Ladkin, 2014).

The researchers Gretzel et al. (2006) affirm that technologies not just support tourists in the pre- and post-trip phase but also the on-trip experience by assisting them with searching and finding information, planning, compare prices and quality of products, making decisions, communicating and sharing their experiences. Supporting technology tools include blogs, internet websites, social networks, online

communities, recommender systems, and mobile devices (Gretzel et al., 2006).

As this research is aiming to gain information about the on-trip phase, it will focus on Neuhofer’s framework of “technology-enhanced tourism experience (Figure 3) which shows how tourists on-site experience is enhanced by ICT (Neuhofer, 2014). The figure displays ICTs central role when it comes to co-creating tourists experiences (Sigala, 2012a; Schmidt-Rauch and Schwabe, 2013; See-To and Ho, 2014 cited in Neuhofer, 2014) and demonstrates that the integration of ICTs into the experience provides new ways for tourism organizations and tourists to co-create and therefore to enhance them collectively (Akaka and Vargo, 2014 cited in Neuhofer 2014).

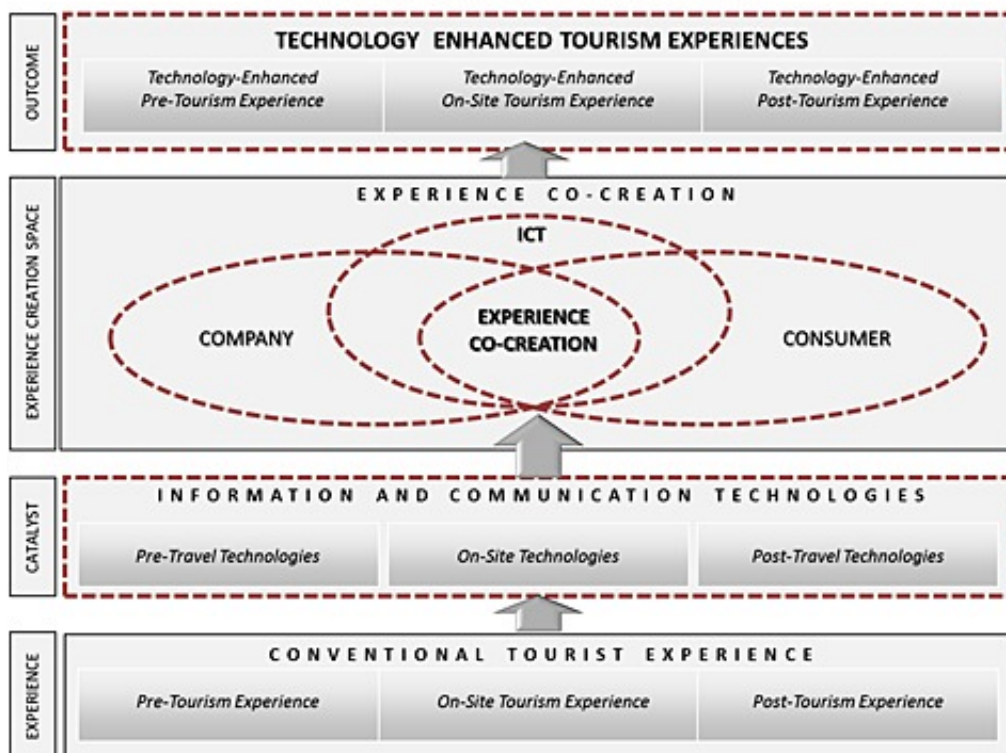


Figure 3: Technology Enhanced Tourism Experiences

(Adapted from Neuhofer and Buhalis 2012, p.4 cited in Neuhofer, Buhalis & Ladkin, 2014)

The academic literature indicates various technologies that support change in experiences. The most conspicuous ICTs are the internet (Werthner & Klein, 1999), mobile technologies (mobile phones, tablets), smartphone applications (google maps), and social media networks (Facebook, Instagram) (Xiang and Tussyadiah, 2014). In addition, gamification, augmented reality, recommendation systems as well as near-field communication technologies play a big role in enhancing tourists experience (Xiang and Tussyadiah, 2014).

The internet as an association of ICTs has developed into an attractive tool for communication and sharing knowledge between different locations around the world (Ramos, & Rodrigues, 2010). Finding information is a major element for travelers in the pre- on- and post phase of their travels (Werthner & Klein, 1999). Steinbauer & Werthner (2007) state that the Internet is the reason for the change in behavior of tourists. The scholars Ramos & Rodrigues (2010) affirm that by combining tourism with the internet the way people travel has been revolutionized. Figure 5 shows the worldwide digital population as of April 2020 (Clement, 2020). By now about 4,57 billion people actively use the internet to gain and receive information (Clement, 2020).

One way the internet has affected the travel & tourism industry is by the creation of new business models (Benson & Standing, 2008 cited in Standing, Tang-Taye & Boyer 2014). One of the first times the tourism industry was affected by the internet was when airlines started selling their services directly to their travelers (Standing et al., 2014). By producers selling directly to their consumers, new intermediaries arose and were immediately demanded by consumers (Standing et al., 2014). For tourism businesses the internet is a new communication and distribution channel that triggers them to be more competitive and improve their performances (Law, Leung & Wong, 2004). It is a tool for businesses to sell their products or services not just locally but also in other parts of the world at any time of the day (Law et al. 2004). The

internet empowers tourists, service providers, and intermediaries to interact and communicate more globally (Buhalis and Law, 2008). OTA and online booking websites gained popularity and resulted in a shift of power from providers to consumers (Standing et al., 2014). It is claimed that the reason for that is that consumers now have the opportunity to access a big amount of information and can compare services and products offered by providers (Law, Qi & Buhalis, 2010 cited in Standing et al., 2014). According to Ramos & Rodrigues (2010), the consumption of travel products and services has massively increased in the last years and will also grow continually in the future due to its convenience and a growing number of people that are able to access the internet. A survey conducted by Amadeus (2013 cited in Law, Leung, Lo, Leung, & Fong, 2015) shows that about 40 percent of business-related trips and 25 of leisure-related trips are booked via OTA. Figure 4 shows the result of a study conducted in the U.S in 2017 (Kunst, 2019). It shows that 88 percent of people questioned indicated that they prefer hotel online booking channels (Kunst, 2019).

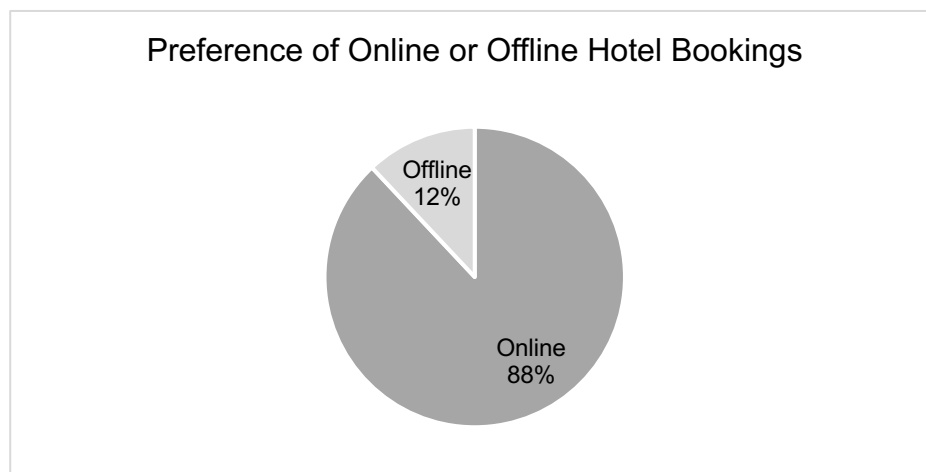


Figure 4: Preference of Online or Offline Hotel Booking in the U.S 2017

(Kunst, 2019)

Especially the development of the internet from Web 1.0 to Web 2.0 has been one of the most important transformations in the last years (Xiang, Wang, O’Leary & Fesenmaier, 2015). Destination marketing drastically

changes after the switch from Web 1.0 to Web 2.0. (Huang, Chou, & Lin, 2010 cited in Standing et al., 2014). Web 2.0 enabled users' new ways of communication and networking (Buhalis and Law, 2008). From that time on, the use of social media was increasing and provided users with a great number of tools like blogs, chat rooms, wikis, and podcasts (Sigala, 2011b; Tussyadiah and Fesenmaier, 2009 cited in Neuhofer, 2014). These tools provided users a new way of sharing experience, opinions, and recommendations with a greater audience (Turban, King, McKay, Marshall, & Lee, 2008 cited in Neuhofer, 2014). As of April 2020, the number of active social media users is estimated to be 3,81 billion (Figure 5) (Clement, 2020).

As the amount of travel-related content and information increases, travelers are given more options on where to travel and what activities they can do (Pan, MacLaurin & Crotts, 2007). More than any other sector the tourism industry is and will also in the future be influenced by the internet (Travel Industry Association 2005 cited in Pan et al., 2007). A report from the World Travel Market from 2011 has shown that more and more people are likely to purchase a hotel room based on information they found on the internet (Koumelis, 2011 cited in Leung, Law, Van Hoof & Buhalis, 2013).

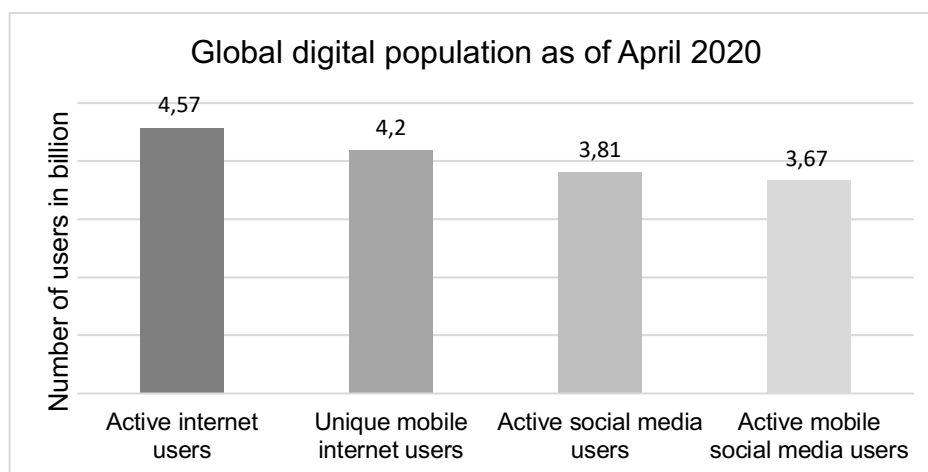


Figure 5: Worldwide Digital Population as of April 2020

(Clement, 2020)

Figure 5 shows the worldwide digital population as of April 2020. By now about 4,57 billion people use the internet to gain and receive information (Clement, 2020).

1.2.1 Mobile Technologies

The continuously improving market for mobile technologies is changing the way people live their lives, work, shop for goods and services, and travel (Jamal & Habib, 2020). Mobile devices like smartphones and tablet computers made technology mobile and therefore shaped tourist's travel experience (Wang et al., 2012). Scholars Schmidt-Belz, Nick, Poslad & Zipf (2002) claim that immobile devices have been replaced by mobile devices since they can be accessed at any time and place. Especially mobile phones, which are known for being portable devices for communication, finding, and receiving information, have already become parts of consumer's everyday life (Wang et al, 2012 cited in Atembe & Akbar, 2014). Statistics show that the market for smartphone devices is expanding (Statista, 2018 cited in Jamal, & Habib, 2020). From 2011 to 2018 the percentage of smartphone users increased by 26 percent (Statista, 2018 cited in Jamal, & Habib, 2020). Since smartphones allow people to connect with the internet on-the-go the number of mobile internet users was able to rise to 4,2 billion (Figure 5) (Clement, 2020).

Various tourism studies show that mobile technology like smartphones has also changed tourists experiences at destinations (Kramer et al. 2007; Kim, Park, and Morrison 2008; Paris, 2012; Rasinger, Fuchs, Beers, and Hopken, 2009; Tussyadiah and Zach, 2012; Wang, Park, and Fesenmaier 2012 cited in Wang et al., 2016). Tussyadiah's (2013) research has shown, that tourists increasingly use their mobile phones for assistance while traveling. Dickinson, Ghali, Cherrett, Speed, Davies, & Norgate (2014 cited in Tan, 2017, p. 615) affirm that the smartphone has many "functional purposes" for tourists exploring a destination. By

being able to find information at any time and place, tourist invests less time in pre-planning their trips and change their plans more easily (Wang et al., 2016). In addition, it has been indicated that the use of smartphones among tourists caused a change in travel paths, time spends at destinations and distances walked during the trip (Wang, Park & Fresenmaier, 2011 cited in Wang & Fesenmainer, 2013).

Smartphones enable the tourist to look up and finding information on-site which enhances the overall experience and has an effect on how the destination is viewed by tourists (Wang et al., 2012). Further, smartphones assist travelers in the decision making-process while on-the-go (Wang et al., 2016) and are used to guide travelers, help to satisfy needs and creates new ways for creating experiences (Dickinson, Ghali, Cherrett, Speed, Davies, & Norgate, 2014 cited in Tan, 2017). Also, mobile phones can be used for exchanging data, a recommendation system, and locations-based services like navigation software (Edwards et al., 2006; Rasinger, Fuchs & Höpken, 2007, cited in Tussyadiah, 2013). Trending Social Local Mobile (SoLoMo) applications like foursquare which provides recommendations based on travelers' preferences have increased tourist's interest to use their phones in the on-site phase (Clemens, 2012 cited in Atembe & Akbar, 2014).

Another interesting part of how smartphones caused a change in tourists' behavior is the use of mobile applications (Apps) (Wang et al., 2012). By offering apps that support travel-related activities, the smartphone allows travelers to be free and flexible (Jamal, & Habib, 2020). Especially apps that are primely designed for tourists but also transportation and social media apps are emerging (Dickinson, Ghali, Cherrett, Speed, Davies & Norgate, 2014). With the increasing interest of usage of applications throughout all stages of tourism product and service consumption, the influence of apps on tourist decision making and behavior is growing (Wang, Park & Fesenmaier, 2011, Höpken,

Fuchs, Zanker & Beer, 2010; Frommer's Unlimited, 2011 cited in Dickinson et al., 2014).

Another important function of the smartphone is communication on-site. Being able to connect with people back home when traveling abroad has always been of importance to travelers (Spruytte et al., 2017). This has only increased since the smartphone was introduced (Spruytte et al., 2017). However, mobile phones have not just increased the call behavior but also increases social networks present of tourist (Mascheroni, 2007 cited in Wang & Fesenmainer, 2013). Statistics show that mobile social media users increased to a number of 3,67 billion (Figure 5) (Clement, 2020). Interestingly, on-site social media use represents the most usage of all three travel phases (Papathanassis & Knolle, 2011 cited in Rathore, Joshi & Ilavarasan, 2017). It has primarily impacted traveler's documentation and sharing behavior of experiences (Wang et al., 2016) but is also used as a tool to find information and get inspired (Papathanassis & Knolle, 2011, Shao & Zhang, 2017 cited in Rathore et al., 2017).

However, smartphones not just support core travel activities as mentioned before. They also support so-called "micro-moments". The term is used to describe smaller events or activities such as finding the next supermarket or estimating the time to queue for a theme park ride (Wang, Park and Fresenmaier, 2010 cited in Wang et al., 2012). Hence, tourist experience at the destination is not limited to the physical environment anymore. By connecting with the virtual environment, a new opportunity for creating experiences is created (Tan, 2017).

Smartphones enable tourists to access the internet at any given time of their travels. This leads to the so-called spillover effect which indicates that people bring tasks and activities they would usually do at home into their travel (Currie 1997; MacKay and Vogt 2012; White and White 2007 cited in Wang et al., 2016). By integrating smartphones into their travels,

travelers can carry out routines and habits like reading a newspaper online or using social media (Currie 1997; MacKay and Vogt 2012; White and White 2007 cited in Wang et al., 2016). A study conducted by Wang et al. (2016) shows that travelers that tend to heavily use their phones in their daily lives stick to their habits and also do so while traveling. Further, the study shows that people that regularly use their smartphone for decision making will also do so when abroad (Wang et al., 2016).

Researchers debate that by integrating mobile devices into traveler's trips a "new generation of modern tourist" labeled as "creative tourist class" will be brought up (Gretzel and Jamal, 2009, cited in Wang et al., 2014, p. 12). The researcher Pihlström (2008) states that mobile phones caused a shift in tourist behavior. He described this shift in behavior "as a change from 'sit and search' to 'roam and receive'" (Pihlström, 2008, p.1). In addition, mobile phones increase tourist's flexibility which allows them to change activities and plans easier (Kramer, Modsching, Hagen, & Gretzel, 2007, cited in Wang et al., 2012). Despite the rapid development of mobile technologies, their further application in the tourism sector is hindered by roaming fees (Bourke, 2017)

1.3 International Roaming in the European Union

People, companies, and the government are nowadays interacting with each other globally. This affected and changed the way people live and travel. Increasing "Intra- European travel" is the result of the open border and raising affluence of people living in the European Union (EU) (Eurostat, n.d. cited in Spruytte et al., 2017, p. 2). Regardless of the growing population of smartphone users which was mentioned before, roaming charges prevent tourists to use their mobile devices also in foreign countries (Harvey, 2008 cited in Mang, Piper, & Brown, 2016).

The growing trend of constantly being connected to the internet has only increased people's wish to be able to use mobile phones without limitations while traveling (Spruytte et al., 2017). The demand for fair

mobile roaming has therefore increased (Spruytte et al., 2017). Bourke (2017) states that travelers were complaining about high roaming costs when using their phones abroad. Spruytte et al. (2017) claim that mobile users were scared that their phone bills might rise (Spruytte et al., 2017) and this led to mobile phone users turning off their phones, only using them when Wi-Fi access was available or ignoring them completely (European Commission, 2014a cited in Spruytte et al., 2017).

When tourists travel abroad and use their mobile phones to communicate with others it is called international roaming or the more commonly used term "roaming" (Bourke, 2017). Tourists get access through their mobile phone operators which provides them access to a foreign mobile network (Bourke, 2017). For being allowed to use this foreign network a fee will be charged (Spruytte et al., 2017). Before 2017 the price of this fee was much higher than service prices for locals (Spruytte et al., 2017).

In the year 2005, the European Commission detected variation of prices of roaming charges in different EU Member countries which did not differ in the service the wholesaler provided. Soon after, the European Commission started working to solve the problem of high roaming charges (Bourke, 2017). The first big step into ending unreasonable priced roaming services was in 2007 when the European Commission (EC) determined a roaming regulation setting a maximum rate a mobile operator could charge for incoming and outgoing calls (Roaming 1) (Spruytte et al., 2017). Two years later EC added a price cap for short message service (SMS) and mobile data services (Roaming 2) (Spruytte et al., 2017). In 2012 the roaming regulations were reviewed a second time and price caps were lowered again (Roaming 3) (Spruytte et al., 2017). During all three roaming phases starting with the year 2007 the goal of the EC was to fully get rid of extra charges for calls, text and data usage in the EU (European Commission, 2011a, BEREC, 2010a, BEREC, 2011a cited in Spruytte et al., 2017). In 2013 a new strategy

called “Roam Like at Home “(RLAH) was presented and was finalized two years later. The EC planned to reduce the roaming costs to zero by summer 2017 (Spruytte et al., 2017). Since June 15, 2017, it is now possible for mobile users with an EU sim card to use their devices for making calls, text messaging for a reasonable price. (Bourke, 2017). From that time on mobile phone users were charged the same price as they would back home and would RLAH when traveling to other countries in the EU (Spruytte et al., 2017).

Bourke (2017) states that the abolishment of the Roaming charges in the EU is a big step for the travel and tourism industry. After the roaming regulations were introduced the cost for consumers was decreasing intensively by over 90% (European Commission, 2017). An estimation of approximately 9.6 billion Euros was saved by consumers in the years 2009 to 2013 (Klugman 2017).

To avoid shockingly high roaming charges which are also called “bills shock” (Infante & Vallejo, 2012), travelers switched off the data roaming option on their mobile devices (Jones & Meyer 2013). This function prevents users to access the internet in areas or counties where they would have to pay an extra charge for the service (Jones, 2014). Further users were advised to use web-based services only when connected to Wi-Fi. By using free Wi-Fi provided by many restaurants bars café and hotels travelers can overcome excessive roaming costs (Jones, 2014). In addition, downloading the necessary information before helps to keep track of additional costs (Jones, 2014). Offline city maps and guides are therefore an attractive way of wayfinding. Buying travel-sim-cards on-site or paying for additional bundle deals was also an attractive way of saving costs abroad (Gerpott & Ahmadi, 2015 & Sutherland, 2001)

According to the European Commission, the habits of travelers in the EU have started to change after the abolition of the roaming charges in 2017 (European Commission, 2017). Change has already been detected in

the first summer the new regulations were applied (European Commission, 2017). The “Flash Eurobarometer survey shows that travelers are indeed aware of the new regulations and are aware of the benefits (European Commission, 2017). Besides, the survey indicates that 71% of Europe’s population knows about the changes (European Commission, 2017). About 72% even think that the new regulations will either benefit themselves or someone close to them (European Commission, 2017). More and more people started using their mobile phones as they do at home (European Commission, 2017). Also, the share of mobile phone users that have never used their mobile phones for texting, phone calls, or data services abroad before has decreased (European Commission, 2017). The new regulations also lead to more people leaving their phones instead of switching them off while traveling (European Commission).

2 Methodology

The literature review shows that there is a need for further researching the topic of roaming charges in the EU and how these changes affect a tourist's experience as a whole. Hence, this section will discuss and provide an overview of the qualitative research design the author has chosen. It will examine interviews as a way of data collection, will present the interview questions that have been constructed and explain the approach to analysis and interpretation of the obtained data.

2.1 Research Design

To identify and analyze this change in tourist experience, this research paper will employ a qualitative research approach. A basis for this qualitative research was gained by an extended literature review. Turner III (2010) states that a qualitative research method is applied to obtain distinctive and unique knowledge on a subject that the researcher is not acquainted with. When conducting qualitative research, the researcher

plays an essential role in qualitatively collecting data by checking papers, observing the participant's behavior, or conducting interviews (Creswell & Poth, 2016). A qualitative research method is chosen when a complex issue can only be understood when talking to the people that are affected by it (Creswell & Poth, 2016). It allows participants to share their experiences by listing what they have to tell about the issue studied (Creswell & Poth, 2016). In addition, Creswell and Poth (2016, p.40) state qualitative research minimizes “the power relationships that often exist between a researcher and the participants in a study”. Furthermore, qualitative research is mainly used for exploratory purposes (Charan, 2015). It helps researchers to understand opinions, beliefs, and experiences of Informants (Creswell, & Plano Clark, 2011, Munhall, 2012, Wuest, 2012, Holloway & Galvin, 2016 cited in Kalu & Bwalya, 2017). Although qualitative research provides important insights into the issue studied, findings cannot be generalized to a wider population (Gheondea-Eladi, 2014).

The data for qualitative research is often collected by conducting interviews (Peräkylä & Ruusuvuori, 2008). The reason for the popularity among researchers is that interviews allow discovering parts of reality that might not be easily accessible (Peräkylä & Ruusuvuori, 2008). These parts of reality include mindsets and experiences (Peräkylä & Ruusuvuori, 2008). Interviews can be described as verbal interactions between the interviewer and the person questioned and are used to collect information on a specific topic (Dunn, 2005 cited in Longhurst, 2003). In comparison to questionnaires, in-depth interviews are used in studies where the researcher wants to gain more detailed information about the problem studied (Adams & Cox, 2008). A challenge of conducting in-depth interviews is its time intensiveness and the high expenditure of preparation and planning process (Adams & Cox, 2008). A researcher needs to find the right mix between structured and less structured to be able to answer questions that participants have during the interviewing

process (Adams & Cox, 2008). However, it is important to understand that less structured interviewing guides make it harder for the researcher to analyze findings in the hindsight (Adams & Cox, 2008). As a result, this thesis will use in-depth interviews as a tool to accumulate information on tourist on-trip experience (Adams & Cox, 2008).

To ensure flexibility and have the opportunity to ask questions in between a semi-structured interview style has been chosen by the author. By using this method, interviewing questions are to some parts arranged in advance (Longhurst, 2003). However, the author still has the opportunity to re-ask or ask further questions if necessary (Longhurst, 2003).

2.2 Sampling

To qualify and therefore being able to participate in an interview the subject has to meet the following criteria:

- Participants in this study must be 18 years or older.
- The informant should own a smartphone of the most common operating systems on the market. A study conducted in 2012 shows that 80% of smartphone users own smartphones that use Android, Apple iOS or RIM as an operating system (comScore, 2013 cited in Wang et al., 2016) An example of mobile phones that use these operating systems are the iPhone, Samsung Galaxy, HTC, Sony Xperia, Google Pixel, Blackberry and many more.
- Besides, a candidate should have traveled to another country of the EU within the last year. The last twelve months were set as a time frame to assure that informants can fully remember details of the trip taken. In addition, the purpose of the trip taken should

be leisure-related (not business-related). Since business trips are mostly pre-organized and have a fixed itinerary business travelers experiences were not included in this study.

- Furthermore, the informant had to be subscribed to a mobile phone plan of its country of residency in the EU.

All informants were selected by using a non-probability sampling method. These non-probability sampling methods include purposive (judgmental) sampling, which can be described as a subjective sampling method in which the researcher judges which members are relevant for the study and convenience sampling method which describes a sampling people that are easy to reach for the author (Emerson, 2015 & Etikan, Musa & Alkassim, 2016). This research paper names 13 participants as its interviewing sample. The sample included nine female and four male interviewing candidates.

Due to time limits and Coronavirus disease 2019 (Covid19) restrictions, these sampling methods were perceived as suitable for this study. Most of the chosen participants are part of the researcher's social group.

2.3 Interview Guide and Questions

To gather knowledge about the change of tourist's experience after the abolition of the roaming charges in the year 2017 a set of 16 interview questions were established. Questions were formed with the base of the academic literature of tourist's experience, technologies effect on on-site experience, and roaming regulations in the EU. The interviewing questions are established to help answer the following RQ:

RQ1: How did the abolition of the roaming charges in the EU change tourist on-site experience?

RQ2: How did mobile usage patterns while traveling change after the abolition of the roaming charges in the EU?

Figure 9 demonstrates the main interviewing questions and the purpose of each question.

Main Interview Questions	Purpose of Interviewing Questions
1. How old are you?	Demographic question
2. What is your gender?	Demographic question
3. Where are you from?	Demographic question
4. Do you own a smartphone?	To checking for qualification.
5. Have you been taking a trip to a country that is an EU-member in the last 12 months?	To checking for qualification.
6. Did you bring your smartphone?	To checking for qualification.

<p>7. What purpose does your smartphone have for you while traveling?</p>	<p>To lead the informant to describe the usage of smartphone while travelling.</p>
<p>8. How did you use your mobile phone during the last trip taken in the EU?</p>	<p>To lead informant to describe all activities the smartphone was used for.</p>
<p>Clarification questions:</p> <p>Do you use your smartphone for on-trip planning? What activities did you plan on your last trip?</p> <p>Are there any smartphone services (like apps) that you primarily use when traveling?</p>	<p>To lead informant to name activities that were planned on-site via the smartphone.</p> <p>To lead informant to state services that are primarily used during on-site travel stage. To lead informant to state all applications that are used for travel purpose only</p>
<p>9. How different is your mobile phone usage while traveling from the daily use? Do you use the phone more/less?</p>	<p>To lead informant to name patterns that can be also be discovered in everyday life.</p>

<p>10. Are there a lot of apps that you use in both travel and daily life? What are they? For what purposes? / Why?</p>	<p>To lead informant to identify apps which spill over from everyday life.</p>
<p>11. How do you feel about being able to use your mobile phone while traveling?</p>	<p>To lead informant to describe feelings and emotions on mobile phone usage at the destination.</p>
<p>12. Does your mobile phone usage affect your on-site travel experience? If yes, how?</p>	<p>To lead informant to explain how smartphone usage has changed the travel experience.</p>
<p>13. Do you think that by constantly having access to the internet the activities and places visited on your trip have changed? If yes, how?</p>	<p>To lead informant to explain how the internet has affected their choice of activities and places visited.</p>
<p>14. Do you use any SoLoMo apps (e.g. Foursquare)? If yes, why (What are you looking for)?</p>	<p>To lead informant to describe how SoLoMo influence decision making process.</p>

<p>And how (do you check them before the trip/during but in advance/ during but at the exact moment you need information)?</p>	
<p>15.What are your thoughts on the RLAT regulations?</p>	<p>To lead informant to describe thoughts and feeling toward the regulations.</p>
<p>16.How do you think your experience has changed after the abolition of roaming regulations in 2017?</p>	<p>To lead informant to compare travel experiences before 2017 and after.</p>

Table 4: Interview Questions

2.4 Data Collection and Analysis

The process of interviewing resulted in a number of 13 interviews. 31 % male and 69 % of female informants were interviewed. Their ages were ranging from 23 to 30 years. In addition, the sample contained four different nationalities. To ensure informant anonymity, the names of respondents were changed to Informant A to Informant M (Table 4).

The following table shows the demographic profile of informants:

Informants ID	Age	Gender	Nationality
Informant A	26	male	Austria
Informant B	24	female	Austria
Informant C	23	female	Austria
Informant B	27	male	Austria
Informant E	27	female	Austria
Informant F	24	female	Germany
Informant G	30	female	Italy
Informant H	26	female	Austria
Informant I	27	female	Luxembourg
Informant J	24	female	Austria
Informant K	24	male	Austria
Informant L	23	female	Austria
Informant M	24	male	Germany

Table 5: Demographic Profile of Informants

Informants were interviewed during May and June 2020. To ensure the full concentration of informants and interviewer the interviews were conducted one-on-one. All interviews were held in the English language. Each Interview lasted between 10 minutes and 31 seconds and 24 minutes 38 seconds. All informants were taking trips from May 2020 to January 2020 and stayed from two up to 14 nights at their destination. Furthermore, interviews were conducted by using the same in advanced prepared questions mentioned before (Table 6). For further details and the full interview guide, see Appendix 1. Due to the current case of Covid19 interviews were conducted mainly via mobile phone with some exceptions of face to face interviewing. All interviews that were held via mobile phone used videotelephony services to communicate with participants. For in-person interviews, the interviewer made sure that the environment the interview was taking place was pleasant and comfortable. Therefore, private homes of informants were chosen as an interviewing space. All interviews where voice recorded lead to a total recording of 3 hours 59 minutes and 17 seconds. Further, the interviews were brought to paper and resulted in a response of 33174 words. Due

to the pre-determined questions being mostly open-ended questions informants were able to answer questions until no new insight was provided. All interviews were brought to paper the same day of interviewing and recording. Before starting the interviews, the researcher assured all participants that data and information gathered during this process were dealt with confidentially and discretely and was solely used to conduct this bachelor thesis.

The summarized transcripts of interviews were first analyzed, and arguments highlighted in the text (Van Kaam, 1959, cited in Wang et al., 2016). By highlighting arguments, the author was able to compare the thoughts, attitudes, and beliefs of informants. After, arguments were summed up and organized (Van Kaam, 1959, cited in Wang et al., 2016). Phrases, sentences, and paragraphs analyzed which helped to connect arguments with concepts reviewed in the literature (Van Kaam, 1959, cited in Wang et al., 2016). All findings were brought to paper and were send to informants to avoid misinterpretation (Lincoln 1985 cited in Wang et al., 2016).

3 Findings & Discussion

For better understanding, the data gathered is presented and discusses in the following two sections. This research gives insights on changes in mobile phone patter and travel experiences of European sim-card holders traveling to other EU member countries. Section 3.1 and 3.2 show findings that provide answers to the previously stated research questions.

3.1 Change of Mobile Phone Usage patter for travels in the EU

Data extracted from the in-dept interviews shows that most informants named navigation, communication, and research & online bookings as their main reason for bringing their smartphones on a trip (Table 5). Comparable findings are shown by Tussyadiah (2013) that names assistance while traveling as an increasing purpose for mobile phone usage. Furthermore, entertainment and picture taking are indicated as proposes for responded to use their smartphone while traveling.

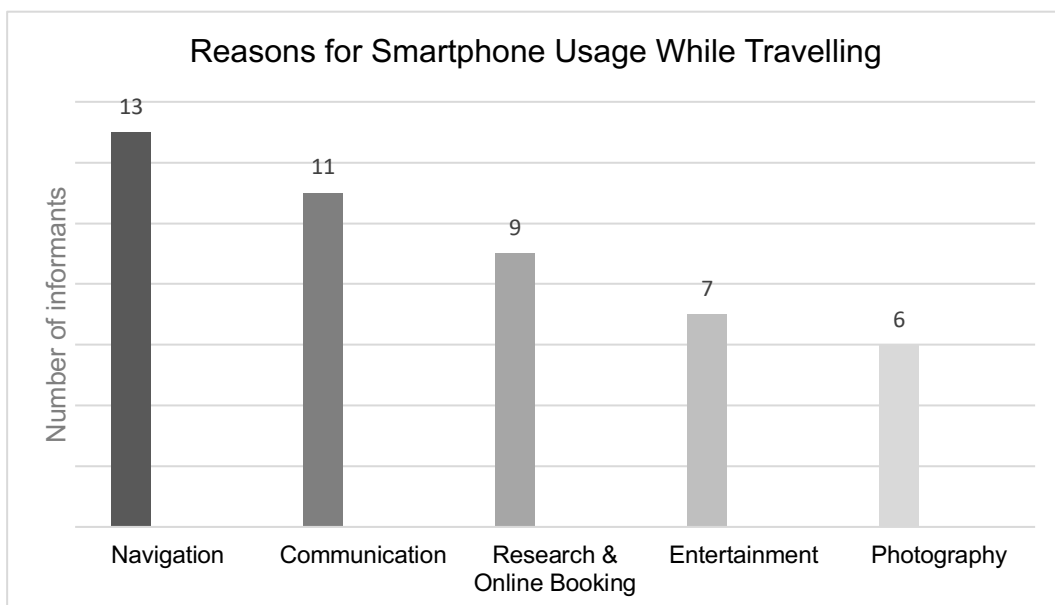


Figure 6: Reasons of Smartphone Usage While Traveling

Navigation

A strong theme that emerged among participants describing their on-site mobile usage patter is navigation.

“I use my mobile phone for on-sight navigation. Before I was able to use my smartphone data without having extra charges, I usually printed out maps to find my way around.” (Informant J)

The interview findings display that respondents primarily use their mobile phones for navigation while traveling. The primary usage of navigation tools can however not be verified by other research. Data shows that that informants increasingly use navigation tools at the destination. The desire of using mobile phones for on-site navigation is also shared by research conducted by (Dickinson et al., 2014). Also, less time is taken by respondents to prepare for wayfinding before going on a trip. The finding that less pre-planning is involved in tourist travel experience if they can use their smartphone is also supported by research conducted by Wang et al. (2016). In general, interview respondents named Google Maps, IOs Maps, and Ways as their navigation apps primarily used when traveling. In addition, local transportation apps were named as attractive apps assisting travelers. Usage of offline city maps and guides suggested by Jones (2014) are used less frequently as states by informants.

Research & Online Bookings

Another reason for mobile phone usage while traveling is research on-site. Informants indicate that they use their mobile phones for finding information, making a reservation, buying tickets, checking opening hours, and comparing services offered. By doing so informants express that their on-site experience is supported by mobile devices. Similar findings are provided by Wang et al., (2012) which shows that the smartphone enhances tourist information search. In addition, data shows that by having the chance to get the information needed at any time, the amount of activity planning by informants in the pre-trip phase decreases. Respondents express that their research shifts more and more from the pre- into the on-trip phase.

Informant A states: *“I use my mobile phone increasingly for research at the destination. I feel like I prepare less due to being able to check for any kind of information at the time I need it.”*

This shift is also addressed by the researcher Pihlström (2008) that expresses that mobile phone usage while traveling caused a shift in tourist behavior. Activities that might have occurred in the pre-trip phase can, therefore, be shifted into traveler's on-site experience. A shift from "sit and search to roam and receive" (Pihlström, 2008, p.1) can also be identified for experiences that have been experienced by respondents. Convenient tools for finding information and doing research suggested by informants are Google, Trip Advisor, GetYourGuide, Booking.com.

It is interesting to see, that informants on-site mobile phone behavior is affected by apps and services that they would not primarily use in their daily lives. Interviewees state that there are many apps and services that they only use when traveling. These include OTA apps, local public transportation apps, reviewing websites. Interesting research from Wang, Park & Fesenmaier (2011), Höpken, Fuchs, Zanker & Beer (2010), Frommer's Unlimited (2011) (cited in Dickinson et al., 2014) shows related findings, that indicates that especially these apps influence tourist decision making process.

When asked about SoLoMo apps, many participants stated that they are rarely using these kinds of apps on-site. The increasing use of these apps which is expressed by Clemens, 2012 (cited in Atembe & Akbar, 2014) cannot be verified from this sample. A minority that pointed out that they are using SoLoMo apps expressed that they use them for finding and comparing restaurants, bars, and things to do in the area they are in. Further, ratings, recommendations, and pictures of the location are named as reasons for using SoLoMo apps by interviewees. Informant B argued that these apps are a helpful tool to explore offers that are located close by, while others said that they rather use digital maps or the internet for satisfying their needs.

Communication

Being able to communicate with other travelers and people back in their home country was named the third most purpose for tourists bringing their mobile phones on their trip.

“I like being able to contact my friends and family back home to keep them up to date.” (Informant L)

Alike data is reported by Spruytte et al. (2017) that affirm that the mobile phone usage for communication with people back home is increasing. In addition, communication with people at the destination was named multiplied times.

“I take mobile calls to make reservations at restaurants and bars.” (Informant D)

Mobile calls, texts, messenger systems, and social media can be identified as the main communication tools for respondents on-trip. Interestingly, video call service is seen as attractive among informants. Furthermore, interviewees argue mobile data usage results in share thoughts, feeling, and especially pictures with other people almost at the time of experiencing them.

Informant E expresses: *“Before I was able to use my phone without having extra charges, I shared photos and memories with my friends and family only when I was able to connect to WiFi or when I returned back home.”*

As Gretzel et al. (2006) research names sharing of memories an activity in the post-trip phase, this data indicates that informants experience a shift of activities from the post-trip into the on-site phase.

Entertainment

Another reported theme is mobile phone usage for entertainment purposes.

As one interviewee put it: *“My mobile phone entertains me whenever there is nothing to do.”*

Especially social media, movie streaming platforms, mobile games, and music streaming platforms are named as the top entertainment instruments by informants. Hence, mobile phones are seen as an appealing option to fill gaps between travel activities.

On-site vs Daily Usage

While talking about differences in mobile phone usage on-trip and at-home participants pointed out that many mobile phone activities, apps, and services spillover from their daily usage. Similarities to these findings are reported by Currie (1997), MacKay and Vogt (2012), White and White (2007) (cited in Wang et al., 2016).

Informant B reported: *“I do not think that my mobile phone usage while traveling is quite different than my usage back home. I am just used to do certain things on my phone daily, so I also do so when I am on holiday.”*

This insight matches with the research of a study conducted by Wang et al. (2016) that shows that travelers that tend to use their phones often in their daily lives, stick to their habits and also do so while traveling. Respondents reveal that tasks like checking the weather, reading news, engaging in social media activities, reading, and answering emails while traveling spillover from their daily lives. Similarities in usage patterns are

provided by Wang et al. (2016). Furthermore, informants stated that they spend more time on navigation and research than in their daily use. However, time spends on the phone due to communication and entertainment decreases while traveling. Some felt that their mobile phone usage while traveling is less than at home, while others considered their on-site and daily mobile phone usage as equal.

3.2 EU Roaming Regulations, Mobile Phone Usage and their Influence on Tourist On-site Experience

To report and discuss findings related to changes in tourist experiences the dimensions of customer experience by Schmitt (1999), Nasermodeli et al. (2013) & Kim et al. (2016) are used.

Sensory

A common view amongst interviewees was that by constantly having access to the internet the offers of things to do and places to visit increased. Products and services are easier to compare and provide informants a bigger selection to choose from.

“I now have the opportunity to inform myself about all activities offered and are not just limited to what my guidebook has to offer.” (Informant D)

Data received by respondents reveals that data service on-the-go try helps them to try different food and drinks and provides them with a culinary experience fitting their needs and wants. Besides, Informant H expresses: “I think that I can find more personalized and fitting offers on the internet by using my phone at the place I am traveling to.” Data extracted from informants’ interviews support findings by (Wang et al., 2012) that show that smartphone usage affects the way a destination is viewed by a tourist.

Cognitive

In addition, respondents suggest that they think that traveling with unlimited mobile phone usage makes it easier to explore places, access information, and solve problems. Informant C describes travel in the EU as hassle-free. Furthermore, interviewees think that using mobile phones without any limitation makes traveling more efficient. The common thought of being less dependent on others is shared by informants. Also, costs are no longer identified as reasons for not using a phone while traveling.

Informant C states: *“I do not worry about costs anymore. It is nice that thoughts about phone bills are no longer part of my travels. I am able to just fully enjoy the moment.”*

Statements like this show that informants are aware of the change of regulations and can be compared to findings of the European Commission (2017). A common view amongst interviewees is that these regulations are benefiting their on-site experience and should be expanded to not EU member countries. These findings are supported by the Flash Eurobarometer survey that showed that the majority of people think that the new regulations provide benefits for themselves or someone they know (European Commission, 2017).

Emotional

Positive, free, and convenient are words that were used by informants to describe how they feel about being able to use their mobile phones while traveling in the EU. In addition, informants stated that they feel safer when they have the opportunity to use cellphone services on-site.

One Informant commented: *“I feel more secure and protected if I can use my smartphone whenever I need to. Especially when I am lost or in an emergency situation, I am happy that I can find help easily.”*

By being able to access the internet at any time of the day informants feel more flexible. Besides, respondents state that they feel more comfortable using smartphone services since extra costs are diminishing. A difference can be detected in comparison to Spruytte et al. (2017) that shows that before the change of regulations tourist was scared to use mobile phone resulting in turning them off completely. While some interviewees felt like free roaming was an extra, others considered it as a necessity for assistance while traveling. However, also negative feelings were expressed towards mobile phone usage while traveling.

“I sometimes feel pressured to use my phone even for the smallest tasks.” (Informant L)

Furthermore, the feeling of distraction and not fully enjoying the moment were reported. While some people that were included in the interviewing sample think that their travel experience was enhanced others pointed out that they think that they do not get the full experience by being distracted by their phones

When questioning the sample on thoughts and feelings about the RLAH regulations, informants argue that they have a positive impact on their travel experience. Good, fair, and convenient are words used to describe the regulations. In addition, interviewees reveal that they are less scared of high costs when using their mobile phones.

As Informant A said: *“Before the introduction of the new regulation I was always scared to have a huge phone bill after my trip. This even made me scared any time I would use it on my travels.”*

Interviewing data reveals that informants are not scared of high costs anymore. Differences can be seen by looking at research from Bourke

(2017) and Spruytte et al. (2017) that expresses traveler's fear of using mobile phone services.

Behavioral

When talking about the effect on mobile phones on traveler's on-site experience respondents discussed an increasing online booking behavior after the change of roaming regulations in the EU in 2017. Further, it has been indicated that they compare offers, services, quality, and prices more often before purchasing them. Akin findings are reported by Wang et al. (2016) which describes mobile phone assistance for decision-making processes at the destination.

In addition, it has been expressed that Informants needed less equipment and help for activities on their trips.

“Due to my mobile phone I need less help for translating or finding places. I would rather use the internet before asking a local for help.”

(Informant E)

This leads to the assumption that respondents are less dependent on other people to support their travel experience. This assumption allies with research from Neuhofer (2014) that smartphones show that travelers are increasingly co-create their own experiences. Other responses added to this topic: “I do not have to bring a map, guidebook, or booking conformations printed out. I have everything I need on my phone. Similar findings are reported by Tan (2017) that tourists' limitation on physical environments to create experiences is diminishing.

By being able to access the internet at any time of the day informants indicate that they are more likely to change their plans.

As Informant M puts it: *“If the weather suddenly changes and it is not possible for me to participate in activities outside, I have the opportunity to change my plans and find something to do easily.”*

Informant A affirms: *“On my last trip locals recommended me to go to a different restaurant as I have planned to. It was really easy to make a reservation and find the place by using cellular data on my phone.”*

The flexibility of travelers has also been reported by tourism and hospitality scholars (Wang et al., 2016). Informants further reveal that they are less searching for WiFi connection and rather use cellular data instead. These findings differ from the Spruytte et al. (2017) that indicate that tourist rather uses their mobile phone services when connected to WiFi.

Also, many respondents agree on the easiness of booking tickets online before arriving at the sight. Saving time and money are named as the two main reasons for their booking behavior. The opportunities to compare prices lead informants to book tickets and make reservations directly on suppliers' websites and use OTAs rather than buying tickets directly at the sight. The popularity of OTA and online booking websites and the shift of power from supplier to consumer is also supported by research from Standing et al. (2014). The opinion that the choice of places explored, and activities chosen are changing by on-sight internet usage is shared by informants. A change in travel paths is supported by previous research (Wang, Park & Fresenmaier, 2011 cited in Wang & Fesenmainer, 2013). Furthermore, Interviewees indicate that social media like Facebook, Instagram, and Pinterest influence their choices while traveling. Informants further state that travel routes differ when having the chance to use a mobile phone. In addition, Reviews and ratings are identified as key indicators for change of activities chosen and places visited by informants. Interviewees commonly describe that

mobile phone data services provide opportunities to also find more local and less touristic places. The above-mentioned findings show similarity to former discoveries that debates that by integrating mobile devices into travelers trips a “new generation of modern tourist” labeled as “creative tourist class” are created (Gretzel and Jamal, 2009, cited in Wang et al., 2014, p. 12).

4 Conclusion

This research aimed to identify changes in mobile phone patterns and tourist's on-site experience after the abolition of the roaming charges in the EU. Based on secondary research the following findings can be concluded:

Generally speaking, this bachelor thesis provides many insights about tourist on-site experience. Further, clear patterns of mobile phone users have been detected. The results suggest that constantly having access to mobile phone services activities like navigation, research, and online bookings on-site has increased. Further findings conclude that communication between tourists, tourism, and hospitality businesses, other travelers, and people back home has been enhanced.

Moreover, the outcomes of this study imply that unlimited mobile phone service leads to everyday activities spilling over into the traveler's on-site experience. It can therefore be concluded by the researcher that mobile phone usage gets similar to the usage in everyday life. In addition, findings suggest that the amount of time spent on the mobile phone while traveling is slightly less or equal to the time travelers spend on mobile phone activities in everyday life.

As the number of tourism products and services offered online increases, findings suggest, that travelers use their phones more

frequently to compare offers at the destination. Further online bookings were indicated as attractive among travelers. It can also be suggested that needs and wants can be satisfied easier. As the use of Wi-Fi services decrease and the usage of cellular data increases for traveling in the EU it can be assumed that tourists are less scared that their mobile phone usage will result in high roaming costs. Further, results suggest that constant access to online data makes traveling less stressful and provides travelers a safer feeling while exploring a destination. It also adds to the spontaneity of travel decisions.

In addition, it can be assumed, that activities experienced by travelers, shift between pre- on- and post-trip phase. Activities that might only have occurred in the pre- or post- phase before the abolition of the roaming charges a now also be detected in the on-site phase.

The results of this research may provide tourism and hospitality businesses with meaningful insights about how and why tourists are using their mobile phones. Moreover, this thesis shows tourism and hospitality firms the importance of integration of phones into their business to ensure that meaningful experiences are created by a tourist. Findings allow local businesses to be more visible by simply adding their pin on Google and Apple maps. This allows them to compete with bigger businesses without necessarily investing in pricey online advertising campaigns. In addition, the researcher recommends businesses to clearly state contact information on their website to ensure that tourists are able to reach and communicate with them easier. As online bookings are booming, tourism and hospitality businesses can attract travelers by integrating online booking opportunities to their websites. Furthermore, findings allow businesses to be more apparent on the internet by asking tourists that have previously visit the sight to provide feedback on reviewing platforms like TripAdvisor.

Limitation and Recommendation

The findings of this thesis have to be seen in the light of some limitations that could be added in further research. Due to the fact that this research is of a qualitative nature, the quality is greatly dependent on the researcher. In addition, this research provides a high volume of data which made it difficult to assess, analyze, interpret, and demonstrate findings. Therefore, the possibility that the researcher influences the results without intention is given.

Generally speaking, qualitative research is dependent upon the experience a researcher has in conducting this type of research. Given the limited experience of the researcher, the representative has in conducting industry-specific qualitative research the accuracy of data collected can be questioned.

As this thesis is limited in time the author was only able to question 13 informants. The sample was selected by two non-probability sampling methods. By choosing the sample using purposive and convenient sampling, some members of the intended population had a lower or higher chance of being selected. For that reason, the findings of this research cannot be generalized and are not representative of the entire population. Due to the fact that responses of qualitative research usually cannot be measured, this type of research only allows comparisons of data.

Moreover, the limitation in resources leads to high representation of a certain nationality of the respondents. The high volume of Austrian informants could have been influencing the findings. In addition, the ages of informants are all below 30 years. Further research should include a broader variety of nationalities and ages living in the EU to avoid any bias.

Furthermore, the research representative can recommend further research of mobile phone patterns and changes of tourist's on-site experiences in the EU. Quantitative research that contains a probability sampling method is recommended to assure representative results that can be generalized to an intended population. A large sample will help to keep sampling errors low.

The last twelve months that were set as a time frame could be seen as a limitation. Due to the outbreak of COVID-19 the researcher was not able to analyze experiences closer to the data collection date. It can be argued that informants can better remember and review the details of a trip right after returning from it.

Lastly, qualitative research is based on a person's individual perspective. As perspectives can change at any time, findings are only dependable at the time collected. Due to the fact that technologies are constantly evolving mobile phone usage of tourists can change over time.

References

Adams, A., & Cox, A. L. (2008). Questionnaires, in-depth interviews and focus groups.

Andereck, K., Bricker, K. S., Kerstetter, D., & Nickerson, N. P. (2006). Connecting experiences to quality: Understanding the meanings behind visitors' experiences. *Quality tourism experiences*, 81-98.

Atembe, R., & Akbar, B. (2014). Tourists co-creation experiences onsite-enabled by mobile devices. *Information and Communication Technologies in Tourism*, 20-28.

Bourke, K. (2017). The abolition of mobile roaming charges and Brexit. Retrieved from <https://commonslibrary.parliament.uk/research-briefings/cbp-8034/>

Buhalis, D. (2003). *eTourism: Information technology for strategic tourism management*. Pearson education.

Buhalis, D., & Law, R. (2008). Progress in information technology and tourism management: 20 years on and 10 years after the Internet—The state of eTourism research. *Tourism management*, 29(4), 609-623.

Charan, A. (2015). *Marketing analytics: A practitioner's guide to marketing analytics and research methods*. World Scientific Publishing Company.

Clawson, M. (1963). LAND AND WATER FOR RECREATION; OPPORTUNITIES, PROBLEMS, AND POLICIES.

Clement, J. (2020). Worldwide digital population as of April 2020. Retrieved from <https://www.statista.com/statistics/617136/digital-population-worldwide/>

Creswell, J. W., & Poth, C. N. (2016). *Qualitative inquiry and research design: Choosing among five approaches*. Sage publications.

Cutler, S. Q., & Carmichael, B. A. (2010). The dimensions of the tourist experience. *The tourism and leisure experience: Consumer and managerial perspectives*, 44, 3-26.

da Costa Mendes, J., Oom do Valle, P., Guerreiro, M. M., & Silva, J. A. (2010). The tourist experience: Exploring the relationship between tourist satisfaction and destination loyalty. *Turizam: međunarodni znanstvenostručni časopis*, 58(2), 111-126.

Dickinson, J. E., Ghali, K., Cherrett, T., Speed, C., Davies, N., & Norgate, S. (2014). Tourism and the smartphone app: Capabilities, emerging practice and scope in the travel domain. *Current issues in tourism*, 17(1), 84-101.

Dickson, S., & Hall, T. E. (2006). An examination of whitewater boaters' expectations: Are pre-trip and post-trip measures consistent?. *Leisure Sciences*, 28(1), 1-16.

Dițoiu, M. C., Stăncioiu, A. F., Brătucu, G., Onișor, L. F., & Botoș, A. (2014). The sensory brand of the destination. Case study: Transylvania. *Theoretical and Applied Economics*, 21(5), 594.

Emerson, R. W. (2015). Convenience sampling, random sampling, and snowball sampling: How does sampling affect the validity of research?. *Journal of Visual Impairment & Blindness*, 109(2), 164-168.

Etikan, I., Musa, S. A., & Alkassim, R. S. (2016). Comparison of convenience sampling and purposive sampling. *American journal of theoretical and applied statistics*, 5(1), 1-4.

European Commission. (2017). End of roaming charges for travelers in the EU in 2017 6 April 2017. Retrieved from https://ec.europa.eu/commission/presscorner/detail/en/MEMO_17_885

Europeans Commission. (2017). First summer without roaming charges: Europeans see benefit of the new rules. Retrieved from https://ec.europa.eu/commission/presscorner/detail/en/IP_17_3241

Expedia. (2014). Unplugged No More: 25-Country Expedia/Egencia Study Reveals High Levels of Dependence and Anxiety Over Mobile Devices Among Travelers. Retrieved from <https://newsroom.expedia.com/2014-10-15-Unplugged-No-More-25-Country-Expedia-Egencia-Study-Reveals-High-Levels-of-Dependence-and-Anxiety-Over-Mobile-Devices-Among-Travelers>

Gerpott, T. J., & Ahmadi, N. (2015). Determinants of willingness to look for separate international roaming services—An empirical study of mobile communication customers in Germany. *International Journal of Information Management*, 35(2), 192-203.

Gheondea-Eladi, A. (2014). Is qualitative research generalizable?. *Jurnalul Practicilor Comunitare Pozitive*, 14(3), 114-124.

González-Reverté, F., Díaz-Luque, P., Gomis-López, J. M., & Morales-Pérez, S. (2018). Tourists' risk perception and the use of mobile devices in beach tourism destinations. *Sustainability*, 10(2), 413.

Gretzel, U., Fesenmaier, D. R., & O'leary, J. T. (2006). The transformation of consumer behaviour. *Tourism business frontiers: Consumers, products and industry*, 9-18.

Haviř, D. (2017). A comparison of the approaches to Customer Experience Analysis. *Economics and Business*, 31(1), 82-93.

Hosany, S. (2012). Appraisal determinants of tourist emotional responses. *Journal of travel Research*, 51(3), 303-314.

Hosany, S., & Gilbert, D. (2010). Measuring tourists' emotional experiences toward hedonic holiday destinations. *Journal of travel research*, 49(4), 513-526.

Infante, J., & Vallejo, I. (2012). Regulation of international roaming in the European Union—Lessons learned. *Telecommunications Policy*, 36(9), 736-748.

Jamal, S., & Habib, M. A. (2020). Smartphone and daily travel: How the use of smartphone applications affect travel decisions. *Sustainable Cities and Society*, 53, 101939.

Jani, D., & Nguni, W. (2016). Pre-trip vs. post-trip destination image variations: A case of inbound tourists to Tanzania. *Turizam: međunarodni znanstveno-stručni časopis*, 64(1), 27-40.

Jennings, G. (2006). Perspectives on quality tourism experiences: an introduction. *Quality tourism experiences*, 1-15.

Jones, R. (2014). Roaming charges: how to avoid post-holiday smartphone bill shocks. <https://www.theguardian.com/money/2014/jun/28/roaming-charges-how-avoid-smartphone-bill-shock-post-holiday>

Jones, R. & Meyer, H. (2013). Data roaming abroad- how to avoid excessive charges. <https://www.theguardian.com/money/2013/jul/12/data-roaming-avoid-excess-charges>

Jung, D., & Cho, M. H. (2015). A discovery of the positive travel experience in pre-trip, on-site and post-trip stage.

Kalu, F. A., & Bwalya, J. C. (2017). What makes qualitative research good research? An exploratory analysis of critical elements. *International Journal of Social Science Research*, 5(2), 43-56.

Kim, H. C., Chua, B. L., Lee, S., Boo, H. C., & Han, H. (2016). Understanding airline travelers' perceptions of well-being: The role of cognition, emotion, and sensory experiences in airline lounges. *Journal of Travel & Tourism Marketing*, 33(9), 1213-1234.

Klugman, C. (2017). EU Abolishes Mobile Roaming Charges. Retrieved from <https://epthinktank.eu/2017/06/14/eu-abolishes-mobile-roaming-charges/>

Kunst, A. (2019). Preference of online or offline hotel booking in the U.S. 2017. Retrieved from <https://www.statista.com/statistics/666643/preference-of-online-or-offline-hotel-booking-us/>

Lalicic, L., & Weismayer, C. (2016). The passionate use of mobiles phones among tourists. *Information Technology & Tourism*, 16(2), 153-173.

Larsen, S. (2007). Aspects of a psychology of the tourist experience. *Scandinavian Journal of Hospitality and Tourism*, 7(1), 7-18.

Law, R., Leung, K., & Wong, R. (2004). The impact of the Internet on travel agencies. *International journal of contemporary hospitality management*.

Law, R., Leung, R., Lo, A., Leung, D., & Fong, L. H. N. (2015). Distribution channel in hospitality and tourism. *International Journal of Contemporary Hospitality Management*.

Leung, D., Law, R., Van Hoof, H., & Buhalis, D. (2013). Social media in tourism and hospitality: A literature review. *Journal of travel & tourism marketing*, 30(1-2), 3-22.

Longhurst, R. (2003). Semi-structured interviews and focus groups. *Key methods in geography*, 3(2), 143-156.

Mang, C. F., Piper, L. A., & Brown, N. R. (2016). The incidence of smartphone usage among tourists. *International Journal of Tourism Research*, 18(6), 591-601.

March, R., & Woodside, A. G. (2005). Testing theory of planned versus realized tourism behavior. *Annals of tourism research*, 32(4), 905-924.

Morgan, M., Lugosi, P., & Ritchie, J. B. (Eds.). (2010). *The tourism and leisure experience: Consumer and managerial perspectives* (Vol. 44). Channel View Publications.

Nasermoadeli, A., Ling, K. C., & Maghnati, F. (2013). Evaluating the impacts of customer experience on purchase intention. *International Journal of Business and Management*, 8(6), 128.

Neuhofer, B. (2014). The technology enhanced tourist experience. *Information and Communication Technologies in Tourism 2014*, 90.

Neuhofer, B. E. (2014). *An Exploration of the technology enhanced tourist experience* (Doctoral dissertation, Bournemouth University).

Neuhofer, B., Buhalis, D., & Ladkin, A. (2014). A typology of technology-enhanced tourism experiences. *International journal of tourism research*, 16(4), 340-350.

Pan, B., MacLaurin, T., & Crofts, J. C. (2007). Travel blogs and the implications for destination marketing. *Journal of Travel research*, 46(1), 35-45.

Pearce, P. L. (2005). *Tourist behaviour: Themes and conceptual schemes*. Channel View Publications.

Peräkylä, A., & Ruusuvuori, J. (2008). Analyzing talk and text. *Collecting and interpreting qualitative materials*, 3, 351-374.

Pihlström, M. (2008). *Perceived value of mobile service use and its consequences*. Svenska handelshögskolan.

Pine II, B. J., & Korn, K. C. (2011). *Infinite possibility: Creating customer value on the digital frontier*. Berrett-Koehler Publishers.

Pine, B. J., & Gilmore, J. H. (1998). Welcome to the experience economy. *Harvard business review*, 76, 97-105.

Prasad, P. (2013). The customer service solution: Managing emotions, trust, and control to win your customer's business [Book Review]. *Management Today*, (Oct 2013), 48.

Quan, S., & Wang, N. (2004). Towards a structural model of the tourist experience: An illustration from food experiences in tourism. *Tourism management*, 25(3), 297-305.

Ramos, C. M., & Rodrigues, P. M. (2010). The importance of online tourism demand. In *10th International forum on tourism statistics 2010*. INE.

Rathore, A. K., Joshi, U. C., & Ilavarasan, P. V. (2017). Social Media Usage for Tourism: A Case of Rajasthan Tourism. *Procedia computer science*, 122, 751-758.

Schmidt-Belz, B., Nick, A., Poslad, S., & Zipf, A. (2002). Personalized and location-based mobile tourism services. Workshop on "Mobile Tourism Support Systems" in conjunction with Mobile HCI, 2002.

Schmitt, B. (1999). Experiential marketing. *Journal of marketing management*, 15(1-3), 53-67.

Sheldon, P. (1997). Information technologies for tourism. *CAB, Oxford*.

Spruytte, J., Van der Wee, M., de Regt, M., Verbrugge, S., & Colle, D. (2017). International roaming in the EU: Current overview, challenges, opportunities and solutions. *Telecommunications Policy*, 41(9), 717-730.

Standing, C., Tang-Taye, J. P., & Boyer, M. (2014). The impact of the Internet in travel and tourism: A research review 2001–2010. *Journal of Travel & Tourism Marketing*, 31(1), 82-113.

Steinbauer, A., & Werthner, H. (2007). Consumer behaviour in e-tourism. In *Information and communication technologies in tourism 2007* (pp. 65-76). Springer, Vienna.

Stienmetz, J., Kim, J. J., Xiang, Z., & Fesenmaier, D. R. (2020). Managing the structure of tourism experiences: Foundations for tourism design. *Journal of Destination Marketing & Management*, 100408.

Sutherland, E. (2001). International roaming charges: over-charging and competition law. *Telecommunications Policy*, 25(1-2), 5-20.

Svabo, C., Larsen, J., Haldrup, M., & Bærenholdt, J. O. (2013). Experiencing spatial design. In *Handbook on the experience economy*. Edward Elgar Publishing.

Tan, W. K. (2017). The relationship between smartphone usage, tourist experience and trip satisfaction in the context of a nature-based destination. *Telematics and Informatics*, 34(2), 614-627.

Tsang, N. K., Chan, G. K., & Ho, K. K. (2011). A holistic approach to understanding the use of travel guidebooks: Pre-, during, and post-trip behavior. *Journal of Travel & Tourism Marketing*, 28(7), 720-735.

Tung, V. W. S., & Ritchie, J. B. (2011). Exploring the essence of memorable tourism experiences. *Annals of tourism research*, 38(4), 1367-1386.

Turner III, D. W. (2010). Qualitative interview design: A practical guide for novice investigators. *The qualitative report*, 15(3), 754.

Tussyadiah, I. (2013). When cell phones become travel buddies: Social attribution to mobile phones in travel. In *Information and communication technologies in tourism 2013* (pp. 82-93). Springer, Berlin, Heidelberg.

Van Vuuren, C., & Slabbert, E. (2012). Travel motivations and behaviour of tourists to a South African resort. *Tourism & Management Studies*, 295-304.

Verhoef, P. C., Lemon, K. N., Parasuraman, A., Roggeveen, A., Tsiros, M., & Schlesinger, L. A. (2009). Customer experience creation: Determinants, dynamics and management strategies. *Journal of retailing*, 85(1), 31-41.

Wang, D., & Fesenmaier, D. R. (2013). Transforming the travel experience: The use of smartphones for travel. In *Information and*

communication technologies in tourism 2013 (pp. 58-69). Springer, Berlin, Heidelberg.

Wang, D., Park, S., & Fesenmaier, D. R. (2012). The role of smartphones in mediating the touristic experience. *Journal of Travel Research*, 51(4), 371-387.

Wang, D., Xiang, Z., & Fesenmaier, D. R. (2014). Adapting to the mobile world: A model of smartphone use. *Annals of Tourism Research*, 48, 11-26.

Wang, D., Xiang, Z., & Fesenmaier, D. R. (2016). Smartphone use in everyday life and travel. *Journal of travel research*, 55(1), 52-63.

Werthner, H., & Klein, S. (1999). ICT and the changing landscape of global tourism distribution. *Electronic markets*, 9(4), 256-262.

Werthner, H., & Klein, S. (1999). *Information technology and tourism: a challenging relationship*. Springer-Verlag Wien.

Xiang, Z., & Tussyadiah, I. (2014, January). Information and communication technologies in tourism 2014. In *eProceedings of the ENTER 2014 PhD Workshop*, Springer International Publishing: Cham (pp. 1-146).

Xiang, Z., Wang, D., O'Leary, J. T., & Fesenmaier, D. R. (2015). Adapting to the internet: trends in travelers' use of the web for trip planning. *Journal of travel research*, 54(4), 511-527.

Zajda, T. (n.d.) Roaming Free Euro Zone.

Zatori, A. (2013). Tourism experience creation from a business perspective. *Budapest: Corvinus University NIVERSITY of Budapest*.

Appendices

Appendix 1

Interview guide



(Zajda, n.d.)

Introduction

Thank you for participating and being part of this interview. You are supporting a Bachelor Thesis research of the Department Tourism and Hospitality Management at MODUL University Vienna. By conducting this research, I would like to get more information on the travel experience and mobile phone behavior of tourists in the European Union (EU). Talking to you will help me to gain this insightful information.

This interview will focus on your travels in the EU in the last year. There are no right or wrong answers, just your personal opinion towards travel behavior and mobile phone usage.

The interview should not take longer than an hour. The interview is voluntary, so you have the opportunity to end this interview at any time if you feel uncomfortable. In addition, I would like to state that everything we talk about will be anonymized.

Before we get started, I want to ask if I can record this interview? The audio recordings will not be shared with a third party. Recordings will be deleted after brought to paper.

Do you have any questions before we get started?

Interview

1. How old are you?
2. What is your gender?
3. Where are you from?
4. Do you own a smartphone?
5. Have you been taking a trip to a country that is an EU-member in the last 12 months?
6. Did you bring your smartphone?
7. What purpose does your smartphone have for you while traveling?
8. How did you use your mobile phone during the last trip taken in the EU?

Clarification questions:

Do you use your smartphone for on-trip planning? What activities did you plan on your last trip? Are there any smartphone services (like apps) that you primarily use when traveling?

9. How different is your mobile phone usage while traveling from daily use? Do you use the phone more/less?
10. Are there a lot of apps you use in both travel and daily life? What are they? For what purposes? / Why?
11. How do you feel about being able to use your mobile phone while traveling?
12. Does your mobile phone usage affect on your on-site travel experience? If yes, how?
13. Do you think that by constantly having access to the internet the activities and places visited on your trip have changed? If yes, how?
14. Do you use any SoLoMo apps (e.g. Foursquare)? If yes, why (What are you looking for)? And how (do you check them before the trip/during but in advance/ during but at the exact moment you need information)?
15. What are your thoughts on the RoamLikeAtHome RLAT regulations?
16. How do you think your experience has changed after the abolition of roaming regulations in 2017?

Wrap-up

I think we have made it to the end of our interview. Is there anything you would like to add to this interview that we have not touched on yet?

I would like to thank you for your time and for participating in my interview. Analyzing how you use your mobile phone while traveling will help me to understand how mobile phone behavior has changed since the abolition of the roaming charges in the European Union.

If you think of anything that might help me in my research, feel free to contact me at any time.

THANK YOU VERY MUCH FOR YOUR PARTICIPATION!