Assessment of the level of customer satisfaction with in-room technological facilities for branded hotels: A case of Best western Plus Addis Ababa

By

Ermias Alemayehu

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BY

ERMIAS ALEMAYEHU   ID SGS/0396/2010A

APROVED BY BOARD OF EXAMINERS

_____   _____

Dean, Graduate Studies   **Signature**

_____   _____

Advisor   **Signature**

_____   _____

External Examiner   **Signature**

_____   _____

Internal Examiner   **Signature**

DECLARATION

I, the undersigned, declare that this thesis is my original work, prepared under the guidance of Mr. Maru Shete (PHD and Associate Professor). All source of materials used for the thesis have been dully acknowledged. I further confirm that the thesis has not been submitted either in part or in full to any other higher learning institution for the purpose of earning any degree.

   Ermias Alemayehu   May, 2020

       Name   Date and Signature

Endorsement

This thesis has been submitted to St. Mary's University, School of Graduate studies for examination with my approval as a university advisor.

Dr. Maru Shete (Associate Professor)   _____   19 May 2020

         Name of Advisor   Signature   Date

St. Mary's University

Addis Ababa/Ethiopia

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Abstract

Customer satisfaction is one of the most important factor in hospitality industry to keep the business surviving and gain a competitive advantage over the rivals in the industry. Branded hotels all over the world are known in providing the latest technological amenities which based on their brand standard to increase the customer satisfaction level. It is recommended that the hospitality industry owners to know the level of their customers' satisfaction in order to fix their mistakes/gaps and to keep their strongest part and gain competitive advantage. This thesis measures the level of customer satisfaction based on available in room technological amenities. The researcher explores different related literatures and previous studies in order to gain a better understanding on the technologies and customer satisfaction. Identified technologies are the new weapons in securing customers satisfaction which has direct relation to customer loyalty. The study uses both qualitative and quantitative approach. The qualitative approach is more focused on arranged interviews with the hotel General Manager and Director of Sales and Marketing on the existing technologies and future plans of the property. The quantitative approach uses arranged questionnaires for 193 hotel customers to rate the importance and satisfaction level for selected 15 technological equipment available in Best western plus Addis Ababa Hotel. The result of the study shows that wireless internet access (Wi-Fi) and Satellite TV are the two most important and satisfactory amenities available for all kinds of customers and customers with different purposes of stay at the hotel. It also had a result that the Hotel management needs to consider updating or changing the room amenities of Telephone, Digital Air-condition and Cable internet, while those equipments are important for the customers but not on satisfactory level. The result revealed that majority of the customers of the hotel are business travelers and wireless internet is the most important one from all 15 amenities for this kinds of travelers.

Keywords: *Satisfaction, Importance, Technological Facilities, Brand Hotel, Customers*

Chapter One

Introduction

1.1. Background of the Study

In today's world technology can be found at every corner. From the local convenience store to your local deli shop, technology makes the world function more efficiently. While some are reluctant to embrace new technological advancements, most of us have some form of technology in our household. The smartphone and home computer are probably the two pieces of technology most households have. There's no debating that technology has become integral in our daily lives, for better and maybe for worse (Lady and the Blog LLC 2019). In the external of increased market expansion and diversification of products, brands save effort, time, and help guests' decision making. Brands include an emotional, because it may help guests to project a social image and attitude (Anholt 2003). Brands can be found in almost all types of tourism goods (Cai 2002).

Brand by producing more and more market share, providing a higher return on investment, and the importance of building customer loyalty, especially in hospitality and tourism industry (Michael 2008). Hotel selling the goods can only be enjoying the goods or services. It's different than other products; tourists are no able to test the goods before purchase. They are also bound geographically to a place and to the culture and environment of the destination are the intangibility and perish ability of tourists' experience. The hotel product of which consumption is also a trait in the choice of a destination. But this depends on how many of guests know about the hotel branding.

Now, more than ever, technology moves the world and companies cannot survive without using it. It has a significant impact on all businesses and the hotel industry is not an exception. Hotels are facing an increasingly competitive market and to differentiate themselves by providing excellent service is not enough. It is vital to offer something different to capture the customers' attention as hotel guests become more and more selective in their choices (Janes & Wisnom, 2003). In this new technological world it is becoming possible to deliver a truly

personalized guest experience in order to exceed the customers' expectations (Accenture, 2012).

Today, leisure guests and business travelers are looking for a new experience. In fact, the customers' expectations for the newest technology continue to grow. The increasing up-take by clients combined with the shorter life cycles of this technology creates a big challenge for hotels. In the past, guestrooms provided access to a different experience with technology that people could not get in their homes. Nowadays, this has changed completely whereby in most cases what clients have in their homes is far superior to anything that is available in a hotel room (Horner, 2012). It is essential to provide in-room technology that reflects what is on the market now, what people are currently using (Trauthwein, 2012), if not greater. Travelers are beginning to think of hotel rooms as a home away from home (Parets, 2004). Therefore, there is an opportunity for hotels to embrace the next generation of consumer technology, investing in the technological amenities that guests' demand to achieve a competitive advantage in order to gain and retain guests.

Technology has had a big impact on society and its ubiquity has grown substantially during the last decades. Therefore, hotels need to follow the evolution of technology to attract clients with a unique experience. New advances in technology continue to alter the relationship between hotels and guests. User-friendly and powerful smart phones and tablets are changing travellers' online preferences and habits, redefining how they research, plan and book a trip. Empowered with more knowledge and social media, today's hotel guest is pushing hotels for improved products and services in their travel experience. From an ownership standpoint, advances in data analytics are transforming the hospitality industry with the potential to enhance a hotel's financial performance and offer detailed insight into customer preferences. As the use of mobile devices, social media and advanced analytics continues to proliferate, and as online distribution channels become more accessible, technology has created new opportunities for hotels to drive operating efficiencies and engage with guests, from booking to checkout.

Several studies have shown the need for understanding what guests really want and their satisfaction with the available services and amenities. Therefore, it is important to get

customer feedback in order to achieve a high level of guest satisfaction (Howell, Moreco & DeMicco, 1993; Skogland & Siguaw 2004).

1.2. Background of the Company

Best Western brand began in the years following World War II. At the time, most hotels were either large urban properties or smaller family-owned roadside hotels. In California, a network of independent hotel operators began making referrals of each other to travelers. This "referral system" consisted of phone calls between one desk operator and another. This small and informal network eventually grew into the modern Best Western hotel brand founded by M.K. Guertin in 1946.

The name "Best Western" originated from the fact that most of the chain's original operators were west of the Mississippi River in the United States. By 1962, Best Western had the only hospitality reservations service covering the entire United States, and in 1963, was the largest motel brand in the industry with 699 member properties and 35,201 rooms. From 1946 to 1964, Best Western had a marketing partnership with Quality Courts, the forerunner of the chain known today as Quality Inns, whose properties were located mostly east of the Mississippi River, and thus not in direct competition with Best Western. This partnership made sense geographically, but was not successful in the long run, and was eventually abandoned. In 1964, Best Western launched an expansion effort of its own operations east of the Mississippi under the name "Best Eastern" for those properties with the same typeset and Gold Crown logo as "Best Western." By 1967, the "Best Eastern" name was dropped and all motels from coast-to-coast got the "Best Western" name and Gold Crown, a move that would further enhance an already successful marketing brand into the "World's Largest Hotel Chain" by the 1970s.

Best western Plus Addis Ababa has been established on 2016. The Best Western Plus Hotel in Addis Ababa is ideally located at Bole Medhanialem area in the heart of the commercial and entertainment district of Addis Ababa, the bustling capital city of Ethiopia. Nearby attractions such as business centers, religious centers, restaurants, bars and Bole International Airport are all within walking distance of the hotel. Guests can relax and unwind in all of our 160 rooms and suites, each designed specifically with the guest in mind to offer them a home away from

home. The hotel also provides free parking on site. The fresh and trendy all day dining restaurant is located on the mezzanine floor and offers an incredible selection of cultural and international delicacies. The Lobby Bar & Cafe offers authentic Ethiopian coffee, sip brick mocktails and fresh display. Room service is available for guests who wish to dine in the privacy of their rooms. The Best Western Plus Hotel in Addis Ababa can also host a wide variety of private functions including; weddings, corporate events, meetings, conferences, and private parties in one of our modern and spacious meeting rooms and halls.

1.3. Statement of the Problem

The world of business is inherently competitive. Every industry has companies trying to rise to the top, which means impressing consumers by learning what they want and finding ways to make those things happen seamlessly. Businesses that invest in delivering on consumer expectations typically see an increase in brand loyalty, which leads to an increase in revenue. This characteristic is especially true of the hospitality industry. When guests stay at a hotel, they're looking for a place where they feel comfortable, safe, and have access to the conveniences they're accustomed to in their daily lives, and hotels are in a race to perfect this.

Best western Addis Ababa hotel has made available more than 15 kinds of technological amenities in guest rooms as package for their stay at the hotel. The researcher has found it convenient to study the satisfaction level and impact of these amenities on guest satisfaction, Hoping to recommend the management of the hotel how much is the impact of these amenities and to identify room technologies which doesn't impact the guest satisfaction.

This study is expected to be important for the Best western Plus Addis Ababa because on this rapidly growing technologies and Hotel industry in our city Addis Ababa, Room technological amenities are expected to be one of the most competitive advantage for the hotels market share. Technology has become a key component in giving one hotel an edge over another, especially with the increasing popularity of a digital-first approach among travelers. By implementing the right tech, hotels can impress guests, streamline operations, and generate more revenue. It's critical for hoteliers to stay current with technological advancements, so they can keep pace with expectations (2019 INTELITY).

1.4. Research Questions

This study will be measuring the impact and satisfaction level of customer satisfaction of guests of branded hotels by in-room technologies. The goal of this study is to analyse if technologies have an impact on customer experience and understand how hotels can enhance their experience with new technology. This study will focus on identifying what the most important technologies are for hotel guests and which latest technologies have the potential to enhance customer experience. This research is expected to answer the below questions: -

- What is the Level of Customer satisfaction based on each technological equipment's placed in house in Branded Hotels?
- What is the potential impact of the latest technological amenities on customer experience in branded hotels (Best western plus Addis Ababa)?
- Which technological amenities are more or less important for hotel guests?
- Are there differences in guests' technological amenity preferences across purpose of travel and age?
- Does the availability of new guestroom technology impact guests' decision in choosing a hotel?

1.5. Objective of the Study

1.5.1 General Objective of the Study

In general, this study will focus on assessing the satisfaction level of Brand hotel customers satisfaction on in-Room technological facilities.

1.5.2 Specific Objective of the Study

- Objective of this study is to assess what is the level of customer satisfaction on the current available in-room technological amenities.
- This study will assess if the availability of technological amenities impact the decision making of customers in choosing a hotel to stay in.

- This study involves on which of the technological equipment's in branded hotel rooms have an impact on the customer satisfaction.
- The study identifies the importance of the available technological equipments.
- The Study also assess the satisfaction of customers with the available technologies based on their purpose of visit/ travel to the Hotel.

1.6. Definition of Terms

The definition of Key Terms for this study includes:

- **BWP –** Best Western Plus
- **BWPAA –** Best Western Plus Addis Ababa
- **CSA** – Customer Service Agent
- **CRM -** is the combination of practices, strategies and technologies that companies use to manage and analyze customer interactions and data throughout the customer lifecycle, with the goal of improving customer service relationships and assisting in customer retention and driving sales growth.
- **HDTV - HDTV**, standing for **high-definition television**, is a new **means** of **television** broadcasting and the machines that take advantage of it. **HDTV** broadcasts video digitally
- **HSIA: High-speed Internet Access** - Internet connectivity at speeds of 1 to 100 Megabits per second (Mbps)
- **ICE -** Interactive Customer Experience
- **In-room safe Electronic** - (or safety deposit box) is an individually secured container usually a metal box which will only be opened with electronic card or access code.
- **IPTV: Internet Protocol Television -** is the delivery of television content over Internet Protocol (IP) networks.
- **CD/DVD -** Compact Disc/ Digital Versatile Disc
- **TV -** Television
- **VoIP: Voice Over Internet Protocol -** is the technology that converts your voice into a digital signal, allowing you to make a call directly from a computer, a **VoIP** phone, or other data-driven devices.

1.7. Significance of the Study

This study will be analyzing the level of customer satisfaction with in room technological facilities of branded hotels and it will also analyse and measure the impact of in-room technologies in guests choice of branded hotels to stay with.

Branded Hotels are expected to deliver full amenity service worldwide. In-Room technological amenities are one of the facilities that the hotel should provide free of charge, only in some cases might be chargeable. This study will help the management of BWP Addis Ababa team to identify the level of their loyal customer's satisfaction with these amenities. Technology is a critical determinant in hotel guest satisfaction. Hotels often utilize technology as a value-added amenity to help promote differentiation and enhance guest satisfaction. The purpose of this study is twofold: to measure and document the level of guest satisfaction with existing technology-based amenities, and to examine the scope of impact of such amenities on overall hotel guest satisfaction.

1.8. Scope and Limitation of the study

The study will be delimited to cover only for Best Western Plus Addis Ababa Hotel only, due to cost and available man power to perform this study. This study might also face a challenge in obtaining information needed for the study due to fear of confidentiality from respondents. Since most of the respondents are expected to be foreigners they might fear for the security while asked questions but the researcher will be coordinating with the hotel managers in convincing and guarantying the guests of their security. This study data will be generated by use of self- reported questionnaires which while considered cost-effective and time - saving, may have the potential for bias. However, the researcher will try the best to minimize the negative effects of such limitations. Therefore, those limitations might not have effects on the findings of the research.

1.9. Organization of the Thesis

The thesis is divided into five chapters, the first part of the study Chapter 1 that will be presented here will be brief considerations concerning the problem statement, the scientific and practical implications of the study, the main goals and finally the global structure of the thesis. The second part of the study Chapter 2 will be consisting the literature review which will focus on related studies and papers on hospitality industry, technological amenities, customer experience/satisfaction, technological preferences across purpose of travel and age, and the 'hotel of the future' - technological trends. Chapter 3 and 4 will describes how this research will be conducted, with careful explanations of the data collection methods and procedures used. The research questions will be identified and chapter 4 will be using statistical analyses to analyse the data collected. And The findings of the analysed data will be analysed and discussed. At the Last chapter (Chapter -5) The results will be analysed and the contribution of this study for Best western Plus Addis Ababa Hotels and for academic research will be presented. The limitations are considered and hints for future developments and investigation will be provided.

Chapter Two

Literature Review

2.1 Theoretical Review

2.1.1. Technology in Hotels

According to ITEEA's Standards for Technological Literacy, Content for the Study of Technology (STL), technology is defined as "the modification of the natural world to meet human wants and needs (ITEA/ITEEA, 2000/2002/2007)". It is the application of scientific discoveries to the production of goods and services to improve the human environment (Winborne, 2003).

Technology in hotels is often applied at two different levels: operational and managerial level, and for in-room guest service (Barker et al., 2003). According to the American Hotel and Lodging Association survey, hoteliers with more than ten years of industry experience identified increasing guest satisfaction (82.4%), increasing employee efficiency (79.9%) and generating revenues (71.3%) as the primary goals for the use of information technology (Brewer, Kim, Schrier & Farrish, 2008). Therefore, technological amenities are normally introduced in this industry to improve the performance of the hotel staff, allowing them to work with more efficiency and also to enhance customer satisfaction (Collins & Cobanolgu, 2008). Many hotels use technology as a value-added amenity to help create differentiation, enhance guest satisfaction, and build loyalty among customers (Cobanoglu, Ryan, & Beck, 1999). During the last years, information technology has significantly changed the way the hotel industry conducts business. Olsen, Connolly, and Allegro (2000) identified Information Technology (IT) as the single greatest force driving change in the hospitality industry.

Previous studies indicate that hotel technology implementations can improve customer satisfaction, increase productivity and reduce costs, which can result in a competitive advantage. (Camisón, 2000; Cobanoglu, Corbachi & Ryan, 2001; Collins & Cobanoglu, 2008, David et al., 1996; Siguaw & Enz, 1999; Van Hoof, Verteeten, & Combrink 1996). However, not all technologies positively impact guest satisfaction (Cobanoglu et al. 2001) and an incorrect choice

of technological amenities may result in customer dissatisfaction (Cobanoglu, 2009). Therefore, it is critical to understand what hotel guests need and want. This knowledge will help hoteliers decide which products or services they should provide or adjust existing offerings in a way that is more appealing to guests, meeting their requirements and expectations (Kotler, Bowen & Makens, 2003; Lazer, Dallas & Riegel, 2006).

2.1.2. Branded Hotels

Now day, Branding is a hot topic in the world. In the human life, anything must talk about the brand. Small part from crew, big part like hotel or Construction Company. Strong Brand will bring a strong benefit to the company. Customer choice brand goods, because this brand will give them good price, good quality or good after-sale service. In the past 20 year, the hotel industry has find out the proliferation of new brands. In 2006, hotel branding totalling approximately 285 new brands in the world. Many hotels of guests are confuse with an similar explosion in the number of brands (UKEssays, 2019).

The Hotel industry sector is generally classified into six categories: luxury hotels, upper-upscale, upscale, upper-midscale, midscale and economy (Miller et al, 2013). "Upscale hotels are sometimes categorized as part of the luxury hotel sector" (Digital Luxury Group, 2013) because "luxury is a very subjective notion and no single criteria could comprehensively define whether a property is luxury or not" (Chu, 2014). An upscale hotel is defined as a hotel that offers luxury amenities and that is classified with four to five stars.

The guests of these types of hotels expect to have an elegant environment, a broad number of facilities and services, and the latest technology such as High-speed Internet Access (HSIA), CD/DVD sound systems, High Definition Television (HDTV) and more. Those hotels offer a high level of quality and comfort. They achieve excellence in every facet of hospitality and are known for their beautiful architecture, landscaping, interior design, and exquisite taste. According to a study, upscale/luxury hotels are 18.2 % more likely to implement hotel technological amenities than economy/mid-range hotels in the next three years (Jung, Kim & Farrish, 2014) in order to increase the quality of the service and consequently achieve their guests' expectations. They must follow the latest technological trends to be competitive in

their segment and to enhance the guest experience. On the other hand, economy and midscale hotels are more likely to implement technology to increase their operating efficiency (Siguaw, Enz & Namasivayam, 2000).

2.1.3 In-Room Technologies Vs Guest Satisfaction

It has been stated that technology is a critical determinant for hotel guest satisfaction (Singh & Kasavana, 2005) and for hotel selection (Cobanoglu, 2001). According to a related study, technology can enhance guest experience and is a substantial factor impacting guest satisfaction. This study found three significant variables: in-room technologies (Voice over Internet Protocol (VoIP) telephone services, Pay-Per-View (PPV) movies, voicemail, game systems and universal battery charges), business essentials (business center services, express check-in/check-out, in-room telephone, alarm clock, and easily accessible electronic outlets) and Internet access. However the variable comfort technologies (in-room electronic safe, guest control panel, in-room PC, mobile access to hotel website, electronic lock, and flat screen HDTV) is the only category that has no impact on hotel guest satisfaction (Cobanoglu, Berezina, Kasavana & Erdem, 2011). Hotel companies tend to have more available resources for monitoring the guest experience because of the clear emphasis on experience and satisfaction customers have when selecting a hotel (Whitford, 1998).

A study found that hotel operators invested more in in-room technology than any other technology for three consecutive years. The top two in-room technology projects planned to be implemented within 18 months are networking (for example, increasing wireless Internet access) and upgrading TVs (Hospitality Technology, 2013). A recent survey of lodging operators found that 62.5% of them reported "successfully" or "very successfully" enhancing customer experiences using in-room technology over the past three years. Only 6.4% believed that in-room technology did not enhance customer experience. And 25% of the respondents reported that in-room technology installations have generated additional revenues. On the other hand, 31.4% stated that the installed in-room technology did not have a positive effect on revenue (Jung et al., 2014).

According to DeMicco & Cobanoglu (2009), technology in the hospitality industry started in the early 1970's and has been quickly evolving.

In the past, entertainment options were limited. But today with the rapid growth of technology, consumers have multiple entertainment options at their fingertips. They expect that hotels will offer at least the same level of amenities as they have in their homes, what they currently using (Trauthwein, 2012), or greater. Guests are using technology like high-speed Internet, high-definition TV, digital entertainment devices and VoIP in their daily lives. Many hotel guests think of a hotel as a home away from home (Parets, 2004).

Some studies indicate that several in-room technologies are being introduced to provide better guest experience (Erdem et al., 2009; Cobanoglu et al., 2011). For example, in 2010 Marriott International tested its Internet Protocol Television (IPTV) initiative in the guestrooms of a pilot hotel - Courtyard Seattle Downtown/Pioneer Square in Seattle, WA. in order to enhance the level of guest experience. According to Neil Schubert, Vice President of Information and Technology for Marriott, the IPTV initiative will allow hotels to provide an interactive service to guests in order to give them the possibility of having a similar experience to the one they have in their homes because half of guests do not travel with their laptop electronic devices with them while traveling and 67% want to use them with the hotel entertainment system (Hotelmarketing, 2008).

At the present time, hotels, especially the upscale and luxury hotels, are competing to provide service with the latest technology for their customers. However, a related study showed that a significant number of customers do not appreciated many of these investments. Some technological entertainment amenities are a low priority for guests, such as, gaming consoles, Internet on TV and in-room fitness amenities. Whereas, other technology such as, Free-To-Guest TV, Guest-Device Connectivity and HSIA are very important to customers and contribute to their high level of satisfaction. However, some amenities need special attention because they were rated as important by guests but with a low satisfaction rating. These included music, universal battery charge and in-room desktop PCs (Bilgihan, et al., 2011).

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2.1.4 Customer Satisfaction and Customer Experience

Customer satisfaction indicates the fulfilment that customers derive from doing business with a firm. In other words, it's how happy the customers are with their transaction and overall experience with the company. According to Meyer & Schwager (2007) customer experience includes all the aspects that a company is offering — the quality of service, advertising, packaging, product and service features, ease of use, and reliability. Customer experience is a complex process of understanding the customers' conscious and subconscious perceptions of their relationship with the organization from all their interactions. Nowadays, customer experience has become a critical differentiator in this competitive, global marketplace. Good customer experience management can improve customer loyalty, strengthen brand preference, boost revenue, and lower costs (Espana, 2006).

Customer experience can include a lot of elements, but it really boils down to the perception the customer has of your brand. Even if you think your brand and customer experience is one thing, if the customer perceives it as something different, that is what the actual customer experience is. You may think you have high-quality products and a strong customer experience, but if a customer gets a broken product that isn't fixed, their perception of your company as lower quality then becomes the reality (Forbes 2018).

Customer satisfaction is a result of the customers' experience, often measured as a degree of "happiness". It can be defined as a customer' state of mind in which their needs and expectations have been met or exceeded with a product or a service. It is described as the link

between perceived quality and post-purchase evaluations. Customer satisfaction can result in a subsequent repurchase and prolong loyalty (Yi, 1991).

2.2. Empirical Literature Review

An empirical literature review is more commonly called a systematic literature review and it examines past empirical studies to answer a particular research question. The empirical studies we examine are usually random controlled trials (RCTs). Because most RCTs have low sampling sizes, we can often see mixed results from study to study and we hope to provide more clarity by combining the results of all existing studies.

2.2.1. Technology in Hotels

The adoption of technology by the hospitality industry started in early 1970s and has been rapidly evolving ever since (Collins & Cobanoglu, 2008; Erdem, Schrier, & Brewer, 2009, Kasavana & Cahill, 2007; Sammons, 2000).

As a general principle, the larger and more complex a hospitality facility (i.e, overnight accommodations, food and beverage outlets, spa treatments, recreational activities, etc.) the greater its reliance on automation (Piccoli & Torchio, 2006; Siguaw et al., 2000).
Technology in hotels is often applied at two levels:
1. At the managerial and operational level; and
2. For in-room guest services (Lee, Barker, & Kandampully, 2003).

Guest oriented technological amenities are typically introduced to enhance guest satisfaction as well as the performance and functionality of hotel staff. In-room technology amenities, designed to provide a more comfortable and safe environment, may include mini-bars, electronic locks and safes, alarm clocks, desktop computers, entertainment systems, climate control systems, fire annunciator and security systems, and others (Collins & Cobanoglu, 2008).

2.2.2. Customer Satisfaction in Hotels

Customer satisfaction is the internal feelings of every individual which may be satisfaction or dissatisfaction resulting from the assessment of services provided to an individual in context to customer's anticipation by an organization. Hotels are continuously trying to improve the service just to satisfy their customer because higher customer satisfaction will leads towards customer loyalty (Ankur, 2018).

According to recent studies, the hotel service sector accounts for 38 percent of the value added in the World Economic Community. In this sector, quality and customer satisfaction play irreplaceable roles! Various researchers such as Knutson and Naumann succeeded to prove that satisfaction of customers is the cheapest mean of promotion. Each year, billions of dollars are spent on improving the level of service quality. It is said that 'doing things wrong' accounts for 30 or 40% of operating costs in service organizations! "It's six to seven times more expensive to gain a new customer than it is to retain an existing customer. A 5% increase in customer retention can increase profits by 25% to 95%"

Measurement also helps the organization compare the difference before and after changes, identify the standard of service delivery and it is a good chance to recognize problems related to the quality of service. Therefore, the measurement of service quality and customer satisfaction benefits company in both qualitative and quantitative way. Gaining a high level of service quality and customer satisfaction equal to enhancement in customer loyalty, market share increase, higher returns on investment, cost reduction and guarantee a competitive advantage. It also has a positive impact on employee satisfaction!

Service quality in the hospitality industry becomes one of the most important factors for gaining a sustainable competitive advantage and customers' confidence in the highly competitive marketplace, and therefore service quality can give the hospitality industry a great chance to create competitive differentiation for organizations (TRILYO 2019). It is thus considered as a significant core concept and a critical success factor in the hospitality industry. A successful hotel delivers excellent quality service to customers, and service quality is considered the life of the hotel.

Service quality consists of three dimensions: *physical facilities, staff, and materials*. It also divided into two aspects: functional quality and technical quality. A similar approach argued that service quality includes three dimensions: functional quality, environment, and technical quality. Another approach confirmed that service quality has five dimensions namely: *assurance, reliability, empathy, tangibility and responsiveness* (TRILYO, 2019).

2.2.3. Impact of Hotel Technologies on guest Satisfaction

According to recent studies, nearly two-thirds of U.S. guests said it was "very or extremely important" for hotels to continue investing in technology to enhance the guest experience and Ninety-four percent of business travelers and 80% of leisure travelers value the ability to use their smartphones to request service and message hotel staff (Little, 2017).

Providing tools that give travelers more autonomy over their hotel stay is one of the key takeaways from a study commissioned by Oracle Hospitality and conducted by Phocuswright of more than 2,700 U.S. and European travelers. Technology has been established as a driver of guest satisfaction and paying attention to this growing expectation can help hoteliers to stand out amid traditional competitors and Airbnb. "The main research shows that technology plays an important role on the experience the customers have during their stay. The expectation is that hoteliers need to invest more in technology and the experience made on property and in the destination," said Dr. Peter Agel, global segment leader for hotels at Oracle Hospitality.

Further Analysis by Beldona and Cobanoglu (2007) involved classification of guest oriented technologies into four quadrants according to expectation of importance and satisfaction with performance. The first group, including express check-in/out, remote control TV, and in room High-speed Internet access were ranked high on both dimensions (Importance and Performance). A second group, awarded high importance but low performance ratings, included wireless internet access, alarm clock, easily accessible electrical outlets and online reservation capabilities. A third group rated technologies at a low importance level in hotel selection but recorded high performance scores once in-house. Group three technologies included web TV, Pay-Per-View movies and in-room personal computers. The fourth group indicated low ratings

for both technology importance and performance. Applications in this group included videoconferencing capabilities, wireless access to hotel website, business center services and plasma screen television.

Chapter Three

Research Design and Methodology

3.1 Introduction

Research methodology should reflect the understanding of the researcher in order to extract valuable results of the study using various methods available, in single or combination form. Methodology is a plan of action that shows how the problems are investigated, what information are collected using which methods, and how this information is analyzed in order to arrive at conclusions and develop recommendations. Research follows some steps and procedures when conducted. Once the problem statement has been formulated, it should clearly portray the kind of data that is required, and the type of analysis that is most appropriate to analyze the data. This chapter describes research approaches with a view of selecting the most appropriate methodology for the research project, including the research strategy and justification of the methodology: the procedure used and sampling techniques to achieve the objectives of the research.

3.2 Research Design

There are different research strategies, such as experiments, surveys, action research, grounded theory and case studies, and all of them have advantages and disadvantages. Therefore, there are three different conditions that indicate the type of strategy that should be used in a research. These conditions are: the type of research question, the control that the investigator has in the actual behavioral events and the focus on contemporary events (Saunders et al., 2009)

Both Qualitative and Quantitative research approaches will be conducted for this study. The objective of this study is to identify in-room technological facilities which have an impact on the guest satisfaction and to identify the satisfaction level of the customer who is using this in-room technological amenities.

Qualitative research will be conducted to gain an understanding of the current technological amenities in Best western Plus Addis Ababa Hotel as well as the future trends and the

managers' perception of the importance of technologies for hotel guests. This study will explore the branded and upscale hotels because they already have sophisticated technology and also because the owners of these hotels are looking for new technology so as to be competitive in this ever-changing world.

3.3. Sample size determination

The target population will be the guests staying at Best western plus Addis Ababa hotel depends on the number and types of rooms. And sample size formulated from the total number of a guests that the hotel can accommodate. On this study the researcher will take the total number of guests that the hotel can accommodate. Information from the hotel shows below.

Total Number of Rooms = 160

Total Number of Single Rooms = 128 (128 Guests)

Total Number of Suite Rooms = 16 (32 Guests)

Total Number of Twin Rooms = 16 (32 Guests)

Total: 128 + 32 +32 = **192 Guests**

The researcher will the total sample size for the questionnaire, which will be delivered to 192 Guests of the Hotel.

3.4. Data Collection Methods

In order to achieve better results and following the recommendations of previous studies, both qualitative and quantitative data has been collected. First, an analysis of website content has been made in order to know which technological amenities are present in the worldwide Branded hotel of Best western Plus Addis Ababa. Other research about the latest and future technology for hotels is carried out prior to designing the guest questionnaires as well as the interview guide for hotel managers.

To obtain this information an analysis of website content and two interviews with hotel

managers of Best western Plus Addis Ababa Hotel has been made. Research questions will be organized for the managers of the hotel so that they will be able to answer the research questions in a qualitative manner and will be collecting ideas of the hotel managers from experience. The interview is expected to have mostly open-ended questions but also will contain some closed-ended questions.

The outline of the interviews was made before the customer questionnaire in order to understand which technology hotels were planning to implement in the future and which recently became mainstream. The main reason for conducting interviews is, as the previous studies from the literature review suggest, the importance of obtaining the view of both customers and managers in order to provide a more comprehensive understanding of the study (Barker, et al., 2003).

The researcher has developed the questionnaire in quantitative way to get quantitative results from the respondents. Quantitative data is designed to collect cold, hard facts. Numbers. Quantitative data is structured and statistical. It provides support when you need to draw general conclusions from your research. A questionnaire is essentially a structured technique for collecting primary data. It is generally a series of written questions for which the respondents have to provide the answers (Bell 1999). The researcher will be developing questionnaire that will allow to collect information from the hotel guests, the questionnaire is expected to collect data's that are capable to answer three of the research questions. "What is the potential impact of the latest technological amenities on customer experience in upscale hotels?", "Which technological amenities are more or less important for hotel guests?" and "Does the availability of new guestroom technology impact guests' decision in choosing a hotel?".

3.4.1. Data Validation and Reliability

Saunders et al, (2012) mentions reliability of data collection techniques or analysis methods which yields consistent findings. The three major threats to reliability of data are:

1. **Subject or participant error**: Few participants complete the questionnaire at different days of the week which yields different results.

2. Subject or participant bias: At time the person who is getting interviewed speaks based on what is expected to say by their managers or boss.

3. Observer error: When there is more than one person-conducting interview, the answer given by the participant might get interpreted in different ways.

The researcher has interviewed the respondents and tell them any queries they have in understanding the questions can ask explanation. The pilot interview questionnaire will be prepared and asked some respondents whom managers of the company to make the questionnaire simpler in terms of understanding and language. This also helps decrease the possible participant error threat to this research. Since the questionnaires should contain same question in different forms which is believed to yield the same answer. This method will help when used in different phases of the research to obtain a variety of information on the same issue and use to obtain a higher degree of validity and reliability through deeper analysis.

3.5. Methods of Data Analysis

The researcher tried to find results and data for this paper from different sources. As stated on the methodology part of this study, questionnaires and interview along with secondary data from the organizations customer satisfaction website and Literatures were used. The data was analysed using percentage, frequencies and difference gaps (mean) by using SPSS (Statistical Package for the social Science) software and Microsoft Excel Spreadsheet.

The researcher used both qualitative and quantitative data analysis methods to understand and analyse the data collected. To analyse demographic characteristics, the travel behaviour of guests in their last stay in Best western Plus Addis Ababa Hotel and some guests' technological preferences frequency tables will be calculated. Descriptive statistics were

calculated for each of the scale variables. In order to test the significant mean difference (gap) between respondents' perceptions of importance and satisfaction with the available technological amenities

Based on the descriptive statistics results, an importance - Satisfaction matrix was created to have a better understanding of the importance and the satisfaction level of each technology, and linear regression analysis was conducted to identify which technological dimensions have a positive or negative impact on guests. Which allows the researcher to measure the level of the customer satisfaction.

Chapter Four

Results and Discussion

The purpose of a Results and Discussion section is to present the key results of the research. Results and discussions can either be combined into one section or organized as separate sections depending on the requirements of the journal to which you are submitting your research paper (www.ref-n-write.com, 2019). The researcher uses subsections and subheadings to improve readability and clarity. Number all tables and figures with descriptive titles. It presents the results as figures and tables and point the reader to relevant items while discussing the results.

4.1. Description and Characteristics of Respondents

For the primary data collection, the researcher used Interview and Survey questionnaire. The interview has been conducted with two of the hotel managers in core positions which are expected to understand customers need in the selected property, Mr. Ivan Luna General Manager of the Best western plus Addis Ababa hotel and Mr. Besufkade Debay Director of Sales and Marketing along with an information technology department representative. Therefore, the interviews aimed to answer the following issues: to better understand the technologies that customers give more value to in a hotel, the impact of them in the customer experience and in the guest satisfaction. One of hotel managers' main goals is to keep their customers satisfied and identifying what generates that satisfaction. They are the persons with better perceptions about their personalities, customs, likes and dislikes.

Another primary data collection method the researcher used is Survey Questionnaire. The questionnaire data collection survey has been implemented at Best western plus Addis Ababa Hotel and distributed to a total of 192 guests of the hotel in 2 weeks' time. From all the questionnaires distributed to the hotel guests 189 responses has been collected successfully and feed to SPSS(Statistical Package for Social Science) for data analysis.

An acceptable margin of error used by most survey researchers typically falls between 4% and 8% at the 95% confidence level. It is affected by sample size, population size, and percentage

(Pollfish, 2019). As per the standard and number of responses collected from the respondents, the 189 responses are valid and the researcher can proceed with confidence level to the questionnaire data analysis.

4.1.2. Demographic description of Respondents

The questionnaire survey has been filled and returned to the researcher by 189 respondents. From all the respondents 116 were males which covers 61% of the respondents and 73 were females which covers 39% of the respondents. Also from the respondents 11 of them aged between 20 – 30 Years old covering 6% of the sample size, 46 respondents aged between 30 – 40 years old(24 %) of the respondents, 104 respondents aged between 40 – 50 years old which is 55% of the sample size covering the most of the sample population size and the rest are 28 respondents which are 15% of the total respondents aged more than 50 years old. From all the total respondents 109 respondents are married, 71 of the respondents are single and the rest 9 are divorced and widowed. And the researcher was able to identify the employment status of the respondents from the questions from the questionnaires and majority of the respondents are employed (93% or 175 of the total sample size) and only 7% or 14 respondents are unemployed.

Table 4.1. below shows frequency of demographic status of the respondents.

Gender	Frequency	Percentage
Male	175	93%
Female	14	7%

Table 4.1 – Gender Frequency of the respondents

Age	Frequency	Percentage
20 – 30	11	6%
30 – 40	46	24%
40 – 50	104	55%
50 – 60	28	15%

Table 4.2 – Age Frequency of the respondents

4.2. Stay at BWPAA

As per the respondents from the questionnaire frequency shows that customers come to Best western plus Addis Ababa hotel to stay on different channels by number of reasons. 18%(34 Respondents) prefer the hotel because of the location, 12.7% by the price they pay for the quality of the hotel, 30.7% for the service and facilities available in the hotel, 21.2% choose because of the technological amenities while 12.7 % comes by the recommendation of others who have stayed at BWPAA hotel previously, 4.8% of the total sample size have chosen the hotel by reviewing online feedbacks while the rest only 1% have any other reasons to come to BWPAA Hotel.

Also from the respondents frequency shows that most of the travellers are business travellers, which are 57% of the total sample size and 8.5% visit and stayed at the hotel for leisure purpose and only 43.4% of the total sample size stayed at BWPAA Hotel for both Leisure and business purpose. The frequency of the travel accompany usually depends on the type and purpose of their stay. Majority of the customers travelled to the hotel alone (56%) and 27% stayed at Best western plus Addis Ababa with work colleagues or friends, 8% as a couple, 7% with a family and the remaining 2% of the sample size didn't specify or have other travel accompanies.

Table 4.3 shows the frequency table for the type of customers and purpose of visit

Purpose of Stay					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Business	108	57.1	57.1%	57.1%
	Leisure	16	8.5	8.5%	65.6%
	Business & Leisure	65	34.4	34.4%	100.0%
	Total	189	100.0	100.0%	

Table 4.3 – Frequency for the purpose of stay

Reason for Choosing Best western Plus Addis Ababa					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Location	34	18.0	18.0%	18.0%
	Price/Quality	24	12.7	12.7%	30.7%
	Service and Facility	58	30.7	30.7%	61.4%
	Available Technology	40	21.2	21.2%	82.5%
	Recommendations	24	12.7	12.7%	95.2%
	Website Review	9	4.8	4.8%	100.0%
	Total	189	100.0	100.0%	

Table 4.4 – Reason to choose BWPAA

How the travel is to BWPAA					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Alone	116	61.4	61.4	61.4
	Friends/Colleagues	57	30.2	30.2	91.5
	As Couple	16	8.5	8.5	100.0
	Total	189	100.0	100.0	

Table 4.5 – Travel status to BWPAA

4.3. Importance and Satisfaction with available Technologies

From the interview analysis, the hotel representative has stated that there are fifteen major technological facilities and facilities in the rooms of Best western plus Addis Ababa: air conditioning, mini bar, hairdryer, telephone, cable/satellite TV, LCD Television, safe, alarm clock and channels, business centre with computers and Internet, and Internet access in both the rooms and in public areas. The Hotel also has radio and coffee/tea facilities in the rooms.

4.3.1. Importance of Available technology

The researcher has used 5-point Likert scale model in order to identify which in Room technological amenities are important to the guests. The room technological amenities have been grouped into three based on the importance level, Very Important, neither very important

nor less important and Less Important. In order to understand which technologies are more and less important for respondents, descriptive statistics for 15 current technological amenities are used.

Identifying the importance of the technological equipment's allow the researcher to measure the satisfaction level of the customers based on the available important in room technology.

The data from the respondents shows that Wireless Internet access is being identified as one of the highest important technology available in the hotel. Next to wireless internet access, Room Telephone, Satellite TV, LCD Television and Digital Air Conditioning being ranked as highly important technologies.

Table 4.6 shows the means and standard deviations for the available technologies with higher and lower levels of importance as reported by respondents.

Descriptive Statistics – Importance of Available Technologies					
	N	Minimum	Maximum	Mean	Std. Deviation
Wireless Internet	189	2.00	5.00	4.8519	.47182
Telephone	189	1.00	5.00	4.8042	.60034
Satellite TV	189	1.00	5.00	4.7249	.76385
LCD Television	189	2.00	5.00	4.6349	.66768
Digital Air Condition	189	1.00	5.00	4.4603	1.02872
Cable Internet	189	1.00	5.00	4.4444	.93589
Public Wi-Fi	189	1.00	5.00	4.4392	.96357
Electronic Safe-Box	189	1.00	5.00	4.4286	.96834
Business Center	189	1.00	5.00	4.4127	.95039
Digital Alarm	189	1.00	5.00	4.3915	.99206
CD_DVD Player	189	1.00	5.00	4.3598	.97177
Hairdryer	189	1.00	5.00	4.2804	1.06725
Telephone Voicemail	189	1.00	5.00	4.2751	1.21973
Speakers	189	1.00	5.00	4.2698	1.01907
Minibar	189	1.00	5.00	4.1852	1.11689

Table 4.6 – Importance Rating of available technologies

The researcher was also able to identify the same from the interview analysis, both respondents stated that the most important technology for guests is clearly the Wi-Fi. According to Ivan, "technologies can have an impact in the customer's decision when it is

making the choice of hotel, but depends on customer motivation. Sometimes some details can make the difference when guests are choosing a hotel".

4.3.2. Satisfaction with the available Technology

Satisfaction questions in your survey garner important information from your customer, employee, or student that may be critical in determining what products, services, or courses you are successfully providing and which may need improvement. Rating levels of satisfaction is critical to a successful survey (SNAP Surveys, 2019).

The researcher has used Five points lickert scale model to measure the level of satisfaction with available 15 technological amenities. The five scale model measures the satisfaction with level 1 being dissatisfied with the technological amenity and 5 being extremely satisfied, In addition the questionnaire have additional options A and B. A implies that stated technological amenity is not available in the room the guest stayed in and B implies the mention technological amenity is available in the room but never used it during the stay. The researcher didn't include all the responses with the choice of A or B since one can't be either satisfied or dissatisfied without using the technological equipment and the satisfaction level can't be measured.

As per the data analysis from the respondents, Most of the hotel guests have used wireless internet access which is available at the hotel and they are satisfied with the wireless internet access. Next to wireless internet access Best western plus Addis Ababa guests are satisfied with Satellite TV, Telephone, LCD Television and Cable internet facility at the property.

Below Table 4.7 shows Mean and Standard deviation analysis of the data from the respondents rating the satisfaction level with identified electronic equipments.

Descriptive Statistics – Satisfaction with Technological Facilities					
	N	Minimum	Maximum	Mean	Std. Deviation
Wireless Internet	184	2.00	5.00	4.7826	.58815
Satellite TV	168	1.00	5.00	4.7262	.71513
Telephone	172	3.00	5.00	4.6744	.69150
LCD Television	176	2.00	5.00	4.6591	.59303
Cable Internet	108	3.00	5.00	4.4630	.82514
Public Wi-Fi	173	1.00	5.00	4.4566	.96124
Digital Air Condition	158	1.00	5.00	4.4304	1.01810
Business Center	109	1.00	5.00	4.4128	.92507
Digital Alarm	148	1.00	5.00	4.4122	.89541
Voicemail	124	1.00	5.00	4.3790	1.10867
Electronic Safe-Box	112	1.00	5.00	4.3571	1.03851
Minibar	139	3.00	5.00	4.3309	.88783
Hairdryer	157	1.00	5.00	4.2739	.99751
Speakers	114	1.00	5.00	4.2632	1.00488
CD_DVD Player	113	1.00	5.00	4.1504	.96567

Table 4.7 – Satisfaction level of customers on the available technological facilities

The second part of the interview analysis was in relation to the impact of technology on customer experience. Ivan answered that "nowadays technologies are essentials in guest comfort therefore they have a big impact". Besufikad also shares the same opinion as Ivan saying, "today, to have a hotel without technologies is not productive".

4.4. Satisfaction - Importance Gap Analysis

Importance-performance analysis, or IPA, is used to gauge how people feel about the quality of service they have received and certain characteristics of a place, issue, or program (Martilla & James, 1977; Sinischalchi, Beale, & Fortuna, 2008). Extension professionals can use IPA to make decisions and prioritize resources by identifying the level of importance and satisfaction clients associate with specific attributes of a program or facility. It is important to identify attributes with the highest mean importance scores and the lowest mean satisfaction score, but separate consideration of mean importance or satisfaction scores is not sufficient to make resource allocation or communication decisions (Levenburg & Magal, 2005).

The researcher used Importance - Performance gap analysis to identify in room technological equipments, which are satisfying the customer experience in Best western plus Addis Ababa hotel, and to measure the satisfaction level of the customers. This Importance – Satisfaction gap analysis will also help the researcher to recommend the hotel management where to invest their money in order to increase the customer experience and satisfaction.

Gap has been identified by calculating the difference of the mean for each technological amenities based on the questionnaires submitted and guests score using Likert scale from 1 – 5. For the Importance satisfaction gap results which are below zero (> 0, Positive Result) means the guests are satisfied with the specific amenity, for the result greater than zero (< 0, Negative Result) means even though that technological amenity is important for the guests they are not satisfied with it or the performance, so the Hotel management should consider updating or changing that product.

Table below shows the Satisfaction gap using SPSS results.

Technological Amenity	Mean	Gap	N	Std. Deviation
Importance LCD TV	4.6420	0.0398	176	0.26962
Satisfaction LCD TV	4.6818			
Importance Satellite TV	4.7202	0.0060	168	0.48322
Satisfaction Satellite TV	4.7262			
Importance CD_DVD Player	3.9646	0.1858	113	0.66209
Satisfaction CD_DVD Player	4.1504			
Importance Minibar	4.1799	0.1511	139	0.64733
Satisfaction Minibar	4.3309			
Importance Alarm	4.4527	-0.0135	148	0.43623
Satisfaction Alarm	4.4392			
Importance Wireless Internet	4.7609	0.0380	184	0.52653
Satisfaction Wireless Internet	4.7989			
Importance Cable Internet	4.4815	-0.0185	108	0.19245
Satisfaction Cable Internet	4.4630			
Importance Telephone	4.7733	-0.0756	172	0.66674
Satisfaction Telephone	4.6977			
Importance Voicemail	4.0968	0.2823	124	0.83189

Satisfaction Voicemail	4.3790			
Importance Electronic Safe Box	4.4018	-0.0179	112	0.56921
Satisfaction Electronic Safe Box	4.3839			
Importance Speakers	3.9912	0.2719	114	0.90510
Satisfaction Speakers	4.2632			
Importance Hairdryer	4.0382	0.2357	157	0.90681
Satisfaction Hairdryer	4.2739			
Importance Public Wi-Fi	4.4509	0.0058	173	0.42450
Satisfaction Public Wi-Fi	4.4566			
Importance Business Center	4.0550	0.3578	109	0.96727
Satisfaction Business Center	4.4128			
Importance Digital Air Con	4.4620	-0.0316	158	0.28600
Satisfaction Digital Air Con	4.4304			

Table 4.8 - Satisfaction - Importance gap

The Figure 4.1 shows the mean difference for the 15 amenities of the Hotel from the 5 point likert scale. The table shows that the guests of BWPAA Hotel guests are not satisfied with the technologies Alarm Clock, Cable Internet, Room telephone, Electronic safe box and Digital air condition available in the property. In addition, the guests are happy (satisfied) with the rest of the available technologies.

To elaborate more visually, the researcher put the below graph to show on which amenities to take action on.
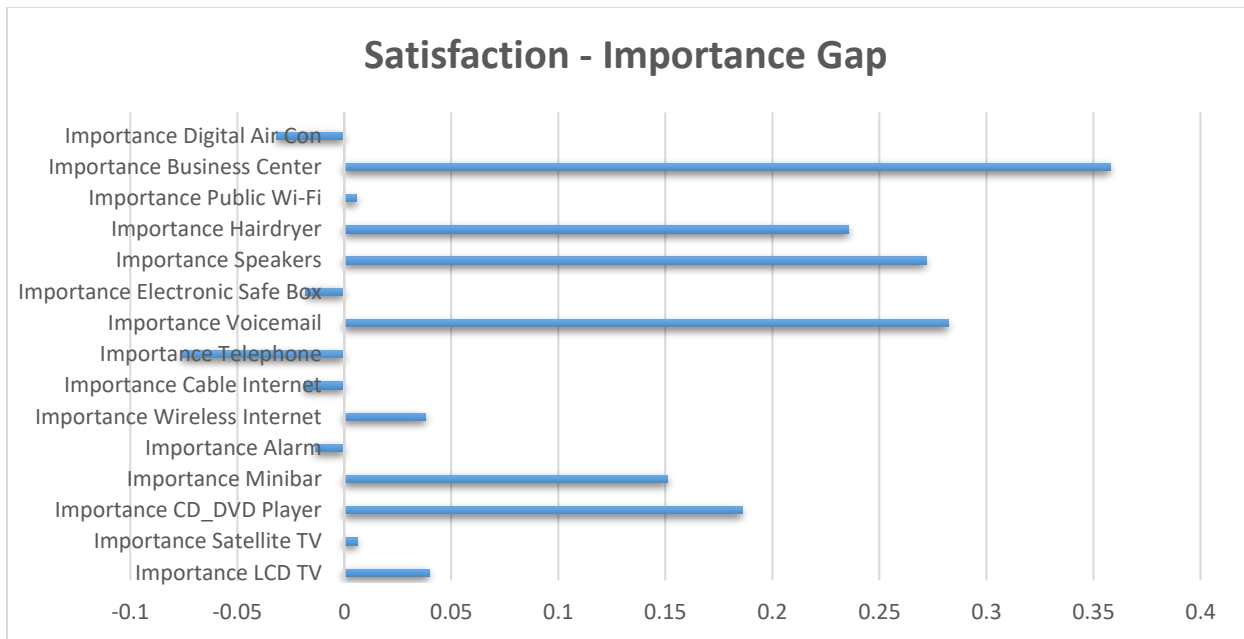
Figure 4.1 – Graphic Importance – Satisfaction Gap

Based on the graph above customer satisfaction is high on the Business centre, Hairdryer, Speakers, voicemail, Wireless internet, Minibar, CD/DVD Player and LCD TV. Which means also the management or the owner of the hotel does not need to focus on these amenities to increase the customer satisfaction level, rather should focus on improving Digital Air conditioning, Public Wi-Fi, Electronic Safe box, Room telephone, cable internet and Digital alarm system.

The General Manager of the hotel has confirmed that the hotel is fully supportive in updating the hotel technology to the newest ones if the guests are really demanding. Mr Ivan stated that "Every unsatisfied guest is like a sailed boat to another cost, which means when a guest is really unhappy with the service and his/her expectation they will not be coming back to the same property to spend a single dime". Direct impact on the revenue of the hotel and the hotel is losing loyal customers.

4.5. Satisfaction

Customer satisfaction is defined as a measurement that determines how happy customers are with a company's products, services, and capabilities. Customer satisfaction information, including surveys and ratings, can help a company determine how to best improve or changes its products and services (asq.org, quality resources 2019).

The selected respondents from the hotel has been asked in general to answer if they are satisfied with the available technologies in Best western plus Addis Ababa despite of the rating with their satisfaction level with the available and the technologies they have used. The researcher did a frequency analysis to get the general answers of the respondents and 87.2 % of the total respondents are satisfied with the available technologies at the Hotel and only 12.8 % of the hotel customers from the sample size are not satisfied with the available technologies.

Table 4.9 – shows frequency of satisfaction with the available technologies.

Are you satisfied with technologies found in BWPAA?		Frequency	Percent	Valid Percent
Valid	YES	164	86.8%	87.2%
	NO	24	12.7%	12.8%
	Total	188	99.5%	100.0%
Missing	System	1	.5%	
Total		189	100.0%	

Table 4.9 – Frequency for Satisfaction with technologies at BWPAA

The researcher also used the question "Do you think the available technologies in the hotel had a positive impact on your experience?" and breakdown how the impact is and how that impact can be changed. It helps to identify how the customer experience can be increased by getting the idea from the customer itself. From all the customers from the sample size 27.5 % which are 52 respondents do not need to have a single change on the available technologies and they are fully satisfied. 56.6 % of the customers has responded "Yes, but I would like to change some of them by new technologies to have a better experience." These are the kinds of

customers which are generally satisfied but they still are not satisfied with some of the available technologies, for them those are outdated and needs to be changed. The hotel management might need to invest to update the hotel room amenities in order to increase customer satisfaction. 14.8 % of the respondents replied "Yes, but I would like to add new technologies to have a better experience.". these kinds of customers are generally satisfied but their experience and satisfaction level would increase more if there are additional technologies beside the existing one. The rest 1.1% which has a frequency of 2 respondents are completely dissatisfied with all available in room technologies, These guests are more likely not be coming back for this hotel again to stay.

Guests not coming back article

Table 4.10 – Below shows the impact of available technologies on guest experience

Do you think the available technologies in the hotel had a positive impact on your experience?				
		Frequency	Percent	Valid Percent
Valid	Yes, but I would like to change some of them by new technologies to have a better experience.	107	56.6%	56.6%
	Yes, but I would like to add new technologies to have a better experience.	28	14.8%	14.8%
	Yes, The available technologies were enough to provide me a good experience.	52	27.5%	27.5%
	No, I need new technologies. The available ones not has a positive impact on my experience.	2	1.1%	1.1%
	Total	189	100.0%	100.0%

Table 4.10 – Impact of available technologies on guest experience

4.5.1. Satisfaction Analysis based on Purpose of Travel

Travellers are people who travels; In many cases, it is one who travels *often*. These travellers have so many reasons why they leave their home place and travel to another place (Dauntless Jaunter, djaunter.com/ 2017).

Travellers are divided into different groups based on their purpose of travel. The major ones are Business Travellers (Travels on their company's dime to one or more destinations with some frequency; business travellers take in a bit of culture and language understanding as they

continually return to the same or similar destinations) and Leisure Travellers (These people usually travel only to vacation. They might be couples, families, or just a person or two who want to go somewhere to get pampered for a short time before returning to their normal lives. May set aside a little time to take in some culture, but probably not) (Dauntless Jaunter, djaunter.com/ 2017).

4.5.2. Satisfaction Ratio Analysis – Purpose of Travel

As per the analysis from the total 189 respondents of the biggest share is for Business travellers which are 108 of the total hotel customers. 16 respondents are staying at BWPAA hotel for leisure and 65 of the respondents are staying at the hotel for both Business and Leisure purpose.

As per the analysis from the respondents, Business travellers are very satisfied with Wireless internet service also the same service does not have any dissatisfied customers from all business travellers. From the total 15 technological amenities all are categorized into 3 based on the ratio of total users of the specific technological equipment and satisfied customers. Wireless Internet, Satellite television, LCD Television, Telephone and Public access Wi-Fi are the top 5 technological equipments that Business customers are highly satisfied with.

On the other hand, Digital air-condition, Cable Internet, Business centre, Digital alarm and Voicemail system are rated on the medium scale (Neither satisfying nor dissatisfying) and the lowest scored equipments that most of the customers dissatisfied with and which the hotel might consider offering before allowing business travellers would be Digital safe box, Hair Dryer, Minibar, Speakers and CD/DVD Player.

To elaborate the discussion more the researcher put the table below.

Business Travelers satisfaction per available room tech equipments					
Available Room Equipment	**N**	**Satisfaction Ratio**	**Satisfied**	**Neutral**	**Dissatisfied**
Wireless Internet	108	0.93	100	8	0
Satellite TV	97	0.91	88	6	3
LCD Television	100	0.89	89	4	7
Telephone	101	0.88	89	12	0
Public Wi-Fi	101	0.82	83	15	3
Digital Air-condition	87	0.80	70	12	5
Cable Internet	62	0.79	49	13	0
Business Center	63	0.78	49	12	2
Alarm	86	0.76	65	20	1
Voicemail	67	0.75	50	11	6
Electronic Safe Box	64	0.73	47	14	3
Hair Dryer	90	0.70	63	23	4
Minibar	76	0.68	52	22	2
Speakers	61	0.67	41	18	2
CD/DVD Player	64	0.64	41	21	2

Table 4.11 - Business Travelers satisfaction per available room technological facilities

Leisure travel is travel in which the primary motivation is to take a vacation from everyday life. Leisure travel is often characterized by staying in nice hotels or resorts, relaxing on beaches or in a room, or going on guided tours and experiencing local tourist attractions (USA Today, 2019).

Since BWPAA hotel is mainly categorized as Business Hotel, usually Leisure guests are rear to stay in such kind of hotels. From the total respondents only 16 customers are staying at the hotel with a purpose of Leisure. Unlike the business travellers LCD Television and Satellite Television are one of the highest ranked room facilities for Leisure customers. The researcher categorizes the same way for the room equipments and the data analysis per used equipments shows that Wireless Internet, Telephone and Hair Dryers are equipments satisfying the guests stay at BWPAA Hotel.

The third kinds of customers are the ones staying at the hotel for both business and leisure purposes. These kinds of customers are mostly having a primary purpose of business or work

related stay at the hotel and extend their last days of stay for relaxing and having a leisure stay.

From the total respondents these dual purpose customers have a number of 65. From all these customers 57 respondents with the ratio of 0.93 are highly satisfied with wireless internet service at the hotel and LCD Television, Telephone and Satellite television and Digital air-condition take their ranking from 2 to 5 on customer satisfaction. The middle five equipments to be rated as medium would be Public Wi-Fi, Electronic Safe Box, Business Centre, Voice mail and Alarm with a satisfaction ratio of satisfaction level and total users rated from 0.79 to 0.75. The lowest five technological amenities that the hotel should consider on offering and updating to increase satisfaction for dual purpose travellers would be cable internet, Hair dryers, Minibar, Speakers and CD/DVD Players. These kinds of customers have a common interest with business travellers and for further understanding the below table shows the ranking of the satisfaction with the purpose of travel.

Dual purpose Travelers satisfaction per available room tech facilities					
Available Room Equipment	N	Satisfaction Ratio	Satisfied	Neutral	Dissatisfied
Wireless Internet	61	0.93	57	3	1
LCD Television	61	0.92	56	2	3
Telephone	57	0.88	50	7	0
Satellite Television	56	0.86	48	8	0
Digital Air Conditioning	60	0.80	48	6	6
Public Wi-Fi	58	0.79	46	10	2
Electronic Safe Box	38	0.79	30	6	2
Business Center	38	0.79	30	6	2
Voicemail	43	0.77	33	8	2
Alarm	52	0.75	39	11	2
Cable Internet	39	0.74	29	8	2
Hair Dryers	54	0.70	38	14	2
Minibar	51	0.69	35	15	1
Speakers	44	0.64	28	16	0
CD/DVD Player	41	0.63	26	12	3

Table 4.12 - Dual purpose Travelers satisfaction per available room tech facilities

The results of the questionnaire has a matching result from the opinion on the General manager of the hotel and director of sales and marketing during the interview. Mr. Ivan believes that "the demand for technologies continues to change depending on the customer type". Besufikad stated that "business travellers are more demanding about technologies, mostly in meeting rooms and regarding the speed of Internet." When the managers were asked if their guests were looking for a new experience through new technology, they said, "yes, some guests are quite demanding", leading them to seek answers that satisfy their needs. Therefore, for them, "the solution is to be versatile and follow what the customer wants". When asked about customer satisfaction with technologies Besufikad's answer was that they have room to improve and add more technological amenities "It is possible to enhance customer satisfaction, the guest could be even more pleased."

Technologies Impact on Decision Making

The Interview analysis marked an interesting aspect highlighted by Besufikad was "the possibility of the hotel to provide to its customers access to technologies that are not implemented in the hotel, there is the possibility of going back to what the customer wants and created dissatisfaction". He stated that "this possibility has more impact when a guest chooses a hotel than the available technologies".

All the chosen 189 respondents have been asked if availability of latest technological equipments have an impact on them for the decision of choosing a hotel to stay in. 93.6 % of all the total customers have an influence of choosing a hotel by analysing the available technological amenities. These are the guests who rate the decision making 4 and 5 which are a total of 181 respondents. Other 9 guests which are 2.6% of the total respondents are neutral about the impact on their decisions to choose a hotel. 1.6 % of the total respondents have rate the impact of technological equipments on their decision making low (Rate 1 and 2), these kinds of guests are the types of guests who usually choose a hotel for a short stay with no need of bigger experience. These kinds of guests are less likely to be disappointed by the satisfaction level of the available technological equipments.

As a total the rating of the respondents has a mean of 4.8 (Table 4.22), which lies on that the guests Have strongly agreed that the availability of technological equipments impact their decision to choose the best hotel to stay.

The Table below shows the frequency of the rating for availability of new guest room technologies impact decision in choosing a hotel.

Availability of new guest room technologies impacts my decision in choosing a hotel				
		Frequency	Percent	Valid Percent
Valid	Strongly Disagree	1	.5%	.5%
	Disagree	2	1.1%	1.1%
	Neutral	5	2.6%	2.6%
	Agree	9	4.8%	4.8%
	Strongly Agree	172	91.0%	91.0%
	Total	189	100.0%	100.0%

Table 4.13 – Frequency for Availability of new technologies on decision to choose hotel

4.5.3. Willingness to Pay Extra for Latest Technologies

The respondents have been asked to rate from 1 to 5, their willingness to pay extra money for a room with available latest technologies (1 being Strongly Disagree and 5 being Strongly Agree). Total of 62.9% gave a rating of 4 and 5, which means more than half of the hotel customers are willing to pay extra if the latest technologies are available. This could a best opportunity for the hotel to make extra revenue by adopting latest technologies to the hotel. 21.7% of the total customers, which are 41 of the total respondents are just neutral about their willingness to pay or not pay, these kinds of guests usually need a convincing point of idea to fell to the category of the payers or non-payers guests. And at last 15.4% of the total guests gave a rating of 1 and 2 meaning that whatever latest technologies the hotel offer for a service they are not willing to pay extra beyond their available budget for a room. These kinds of guests are usually expected to be company guests and need to stay on the border of a budget to spend on the room.

Willingness to pay extra money for availability of latest technology have a mean of 3.92 (Table 4.22), which can allow the researcher to generalize that approximately the customers are willing to pay extra for latest technologies and there are number of guests which needs convincing to spend their extra money on this and the hotel is expected to use marketing strategies for convincing or upselling.

The Table below shows the frequency analysis for the willingness to pay extra money for the availability of latest technologies.

Willing to pay extra for a guest room, which has the latest technologies.		Frequency	Percent	Valid Percent
Valid	Strongly Disagree	16	8.5%	8.5%
	Disagree	13	6.9%	6.9%
	Neutral	41	21.7%	21.7%
	Agree	18	9.5%	9.5%
	Strongly Agree	101	53.4%	53.4%
	Total	189	100.0%	100.0%

Table 4.14 – Frequency of willingness to pay extra money for new technologies

Chapter Five

Summary, Conclusion and Recommendation

This study was conducted to assess the satisfaction level of customers staying at Best western plus Addis Ababa hotel on the available in room technological equipments. The study aimed to answer the five research questions "What is the Level of Customer satisfaction based on each technological equipment's placed in house in Branded Hotels?", "What is the potential impact of the latest technological amenities on customer experience in branded hotels (Best western plus Addis Ababa)?", "Which technological amenities are more or less important for hotel guests?", "Are there differences in guests' technological amenity preferences across purpose of travel and age?" and "Does the availability of new guestroom technology impact guests' decision in choosing a hotel?".

Available 15 technological equipments has been chosen based on the interview with the hotel general manager and director of sales and marketing. Also 193 Questionnaires distributed for all the hotel customers to be filled out.

5.1. Summary of Findings

Best western plus Addis Ababa got a chance to operate in the capital city of Ethiopia being as an international branded and standardized hotel, providing best available technological facilities for its customers. In general, more than 86% of its customers are very satisfied with the technological facilities provided to them during their stay in the hotel.

Major Findings of the Study

- All the 15 technological equipments available at Best western plus Addis Ababa hotel got a rating of high importance level for their customers. Top five equipments identified as most important are Wireless Internet, Satellite Television, LCD Television, Telephone and Digital air conditioning.
- In average all the customers who have used the available technologies have a total average mean result above 4 meaning they are satisfied with the available

technological equipments. Top 5 technologies has been chosen as the most satisfactory for the customers, these are Wireless Internet, Satellite Television, LCD Television, Telephone and Cable Internet.

- Importance – Satisfaction gap analysis showed that 5 of the available technological equipments doesn't meet the satisfaction of the customers compared to the importance rating of the equipments. This has been analysed by getting the difference from the Importance mean score subtracting the satisfaction mean score for the customers who have used those equipments only. These technologies are Digital Air-Condition, Electronic Safe-Box, Telephone, Cable Internet and Digital alarm.

- 91% of the total customers have an impact of taking into consideration the technological equipments available in the hotel before choosing it. The result shows that guests first check the major technologies which are available in the hotel which they need before making the decision of choosing a hotel. Interview analysis describes the same that available technologies clearly affect the decision of choosing a hotel.

- 53% of the total customers are willing to pay extra if the hotel provides the latest technological amenities.

- Business Travellers are being identified as one of the major customers of the hotel and they are 65% of the total guests staying in Best Western Plus Addis Ababa. The Interview analysis shows that, these types of guests are really demanding specially for Wi-Fi and meeting rooms. The hotel should take into consideration on room assignment for these kinds of guests to increase customer satisfaction.

- The Hotel also have dual purpose travellers, which are staying at the hotel for Business and work being their primary purpose and Leisure being the second priority of the visit. These types of guests are 27% of the total customers and have same needs as sole purpose business travellers.

- Guests decision making to choose a hotel with latest technological facilities impacts the same guests willingness to pay extra for these latest technological equipments available in the hotel rooms.

Recommendation for Hotel and Future study

The major findings and summary of the study in general have a positive result for the hotel Best Western Plus Addis Ababa current technological facilities with their customer satisfaction level. To increase on the service level and increase the brand standards for the hotel the researcher recommends the below points to be considered.

- The hotel to take possible actions in updating the existing technologies to the latest level or to the level where it meets the satisfaction of the customers in relating to the importance (Major equipments are Digital Air-Condition, Electronic Safe-Box, Telephone, Cable Internet and Digital alarm).
- The hotel and other researchers to do further studies on Customer loyalty programs. Since customer loyalty is directly related to the satisfaction level of the customers.
- Since technologies never stop growing researches should be done on emerging technologies and assessing the need of customers coming from different parts of the world by grouping into continents.

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Appendix – 1

Interview Questions

St. Mary's University
School of Graduate Studies

Thank you in advance for your voluntary participation in completion of this questionnaire. I am doing thesis on "**Assessing the level of customer satisfaction with in-room technological facilities for branded hotels: A case of Best western Plus Addis Ababa**".

The goal of this study is to analyze the impact of technology on customer experience in Best western Plus Addis Ababa. The target participants for this questionnaire are customers, with more than 18 years old, that have already attended in one of the Best western Plus Addis Ababa Hotel Rooms within the past 12 months.

All answers are anonymous and confidential; the data collected will only be used just for academic purposes.

Did you stay in Best western Plus Addis Ababa Hotel?

☐ Yes   ☐ No

If you answered NO, You do not have to proceed with the questionnaire, If YES you can start.

I.   Demographic Characteristics

1. How old are you? _____
2. Gender?   ☐ Male   ☐ Female
3. Marital Status?   ☐ Married   ☐ Single   ☐ Divorced/Widowed
4. Current Employment status?   ☐ Employed   ☐ Unemployed

II.   Stay at Best western Plus Addis Ababa Hotel

1. Why did you choose Best western Plus Hotel?

☐ Location   ☐ Price/Quality   ☐ Service and Facilities   ☐ Technological Amenities

☐ Recommendations   ☐ Website Review   ☐ Other: _____

2. What was the main purpose of your trip when you stayed at the hotel?

☐ Business   ☐ Leisure   ☐ Business and Leisure   ☐ Other: _____

3. How did you travel to the Hotel?

☐ Alone   ☐ With Friends/Colleagues   ☐ As a Couple   ☐ With Family   ☐ Other

III.   Importance and Satisfaction with Technologies according to your stay at Best western Plus Addis Ababa Hotel

Please Rate the technologies below according to importance scale from 1 to 5. 1 Means not important at all and 5 means extremely important to have good experience

In Room and Hotel Technologies	Not Important			Very Important	
LCD Television	1	2	3	4	5
Cable/Satellite TV	1	2	3	4	5
CD/DVD Player	1	2	3	4	5
Mini Bar	1	2	3	4	5
Alarm Clock	1	2	3	4	5
Wireless Internet	1	2	3	4	5
Cable Internet	1	2	3	4	5
Fixed and Portable Telephones	1	2	3	4	5

Voice Mail	1	2	3	4	5
In-Room Electronic Safe box	1	2	3	4	5
Speakers	1	2	3	4	5
Hair Dryer	1	2	3	4	5
Wi-Fi at the Public area of the hotel	1	2	3	4	5
Business Center Service	1	2	3	4	5
Digital Air Conditioning	1	2	3	4	5

Please Rate the technologies below according to your satisfaction with them with the scale 1 to 5. 1 means not satisfied at all and 5 means extremely satisfied. Other Options Are **A**- Not available in my Room and **B**- Available but never used it.

In Room and Hotel Technologies			**Not Satisfied**			**Very Satisfied**	
LCD Television	A	B	1	2	3	4	5
Cable/Satellite TV	A	B	1	2	3	4	5
CD/DVD Player	A	B	1	2	3	4	5
Mini Bar	A	B	1	2	3	4	5
Alarm Clock	A	B	1	2	3	4	5
Wireless Internet	A	B	1	2	3	4	5
Cable Internet	A	B	1	2	3	4	5
Fixed and Portable Telephones	A	B	1	2	3	4	5
Voice Mail	A	B	1	2	3	4	5
In-Room Electronic Safe box	A	B	1	2	3	4	5
Speakers	A	B	1	2	3	4	5
Hair Dryer	A	B	1	2	3	4	5
Wi-Fi at the Public area of the hotel	A	B	1	2	3	4	5
Business Center Service	A	B	1	2	3	4	5
Digital Air Conditioning	A	B	1	2	3	4	5

1. Are you satisfied with the technologies that you found in Best western Addis Ababa?

☐ Yes   ☐ No

2. Do you think that available technologies in hotel had a positive impact on your

experience?

☐ Yes, but I would like to change some of them by new technologies to have a better/different experience

☐ Yes, but I would like to add new technologies to have a better/different experience

☐ Yes. The available technologies were enough to provide me a good experience. I would not change or add anything.

☐ No, I need new technologies, more advanced; the available ones not had a positive impact on my experience.

☐ Not at all, the available technologies had a negative impact on my experience, they were very outdated

3. If you have all the following options available to do the **Check-in,** which one would do you prefer?

☐ Front Desk   ☐ Self Service Check-in   ☐ Smartphone Application

☐ Other: _____

4. If you have all the following options available to do the **Checkout**, which one would do you prefer?

☐ Front Desk   ☐ Self Service Check-in   ☐ Smartphone Application

☐ Other: _____

5. What do you like to have available in your future hotel stay, related with technologies that is not referred in this questionnaire?

_____

6. The availability of new guest room technologies impacts my decision in choosing a hotel

Strongly Disagree				Strongly Agree
1	2	3	4	5

7. I am willing to pay extra for a guest room, which has the latest technologies.

Strongly Disagree				Strongly Agree
1	2	3	4	5

8. Are you looking for a unique/different experience in terms of your stay and facilities?
☐ Yes   ☐ No   ☐ I am just looking for a room, the experience does not matter to me

Appendix – 2

Interview Questions for Hotel Managers

Interview guide for hotel managers

I. Current technological amenities in upscale hotels

1. What are the current technological amenities for guests in the hotel?

II. Manager Perception of the guest's experience regarding technology

2. Do you think that technology has a big impact on customer experience?

3. Which technologies do you think are most important for guests?

4. Do you consider that the available technology at the hotel has an impact on the customer's decision when choosing a hotel?

5. Is there a big difference in the demand for technologies between leisure guests and business travellers?

6. Have customers been looking for a new experience with new technology?

7. Do you think that customers are satisfied with the available technology?

III. Manager Perception – importance of new technology and the hotel's success.

8. Which is the main goal of the implementation of new technology for the hotel?

    - Improve customer experience and consequently their satisfaction
    - Improve efficiency of employees
    - Increase profits
    - Reduce costs
    - Other

9. Do you consider investing in new technologies to provide a better customer experience to be important?

10. Have the implemented technologies contributed to the success of the hotel?

11. Was there an increase in the occupancy rate due to the implementation of some technologies?

IV. Innovation & development

12. Is there a team for innovation and development testing of new technologies in pilot rooms to get customer feedback?
13. What were the latest implemented technologies in the hotel?
14. Which technologies do you intend to implement in the future?