International Journal of Circuit, Computing and Networking

E-ISSN: 2707-5931 P-ISSN: 2707-5923 IJCCN 2022; 3(2): 49-55 Received: 13-05-2022 Accepted: 17-06-2022

Mark Quaye Affum

MSc. Information Technology ICT Centre, Cape Coast Technical University, Cape Coast, Ghana

Oliver Osei Dwomoh

Department of Purchasing and Supply, Cape Coast Technical University, Cape Coast, Ghana

Finding accommodation in the central region with digital technology

Mark Quaye Affum and Oliver Osei Dwomoh

DOI: https://doi.org/10.33545/27075923.2022.v3.i2a.49

Abstract

Tourism is a gradually and globally emerging industry, which has grown from the pursuit of a privileged few to a mass movement of people. It is now one of the fastest growing industries of the global economy and a major socio-economic activity with the urge to discover the unknown to explore new and strange places, to seek changes in environment and to undergo new experiences. Tourism has evolved during the latter half of the twentieth century from the marginal and locally insignificant activity to a widely dispersed economic giant, which in 1999 accounted for some sizeable percent of the global economy. The main objective of the study is to examine the importance of ICT in quality service delivery in the accommodation sector of Ghana's tourism industry.

It was revealed that all the ten hotels used the telephone, but 60% of them used only telephone while the other 40% used the internet as well. It was also found that 68% of the guests used Telephone, 16% used Internet and 16% did not use any ICT facility in their hotels.

It can be concluded that ICT is not significantly used in the accommodation sector in Cape Coast. The Telephone was the most common ICT facility used in the hotels. The internet was used to a less degree, perhaps due to cost and technical challenges. It was surprising that none of the hotels used Property Management System. It can also be concluded that a greater number of guests of hotels in Cape Coast use the telephone.

Keywords: Accommodation, digital, central, technology, region, finding

1. Introduction

1.1.1 Background of the study

Tourism is a gradually and globally emerging industry, which has grown from the pursuit of a privileged few to a mass movement of people. It is now one of the fastest growing industries of the global economy and a major socio-economic activity with the urge to discover the unknown to explore new and strange places, to seek changes in environment and to undergo new experiences (Robbinson, 1979, xxi) [17]. In Ghana, Tourism is the 4" highest industry after mineral, agriculture and foreign remittances in terms of foreign exchange earnings and is expected to be the first in the near future when well nurtured, (Ghana Tourism Authority, 2011) [9].

Digital technology is an umbrella term that includes any communication device or application encompassing, radio, television, cellular phones, computer and network, hardware and software, satellite systems and so on, as well as the various applications with them such as conferencing and distance learning. Digital technology recently relieved people from the hustle and bustle they go through for their needs, that is, businesspersons and women do not travel again to deliver messages that will need urgent attention, but just deliver it through the internet, cellular phones, etc.

Digital technology has of late given managers of various organizations the ease of working with their clients and offering them quality services and helping provide educational information, providing more realistic information on life elsewhere and enhancing interaction with people over long distance. The importance of ICT in the tourism and hospitality industry cannot be gainsaid.

1.1.2 Statement of the problem

Tourism has evolved during the latter half of the twentieth century from the marginal and locally insignificant activity to a widely dispersed economic giant, which in 1999 accounted for some sizeable percent of the global economy, (Weaver and Opperman, 2000:4) [19].

Corresponding Author: Mark Quaye Affum MSc. Information Technology ICT Centre, Cape Coast Technical University, Cape Coast, Ghana As a nation, Ghana has responded to the ICT evolution in several ways. The government, educational institutions the private sector and individuals all responded to this challenge.

Hotels play a vital role in the tourism sector and the Ghanaian economy as a whole. Although hospitality organizations form a substantial constituent of the economy, there is limited knowledge available surrounding the adoption of digital technologies by hotels? There is also a general lack of information on how hotel guests use the Internet for information, booking and purchase of travel products and services. The research aims at studying the recent and other developing applications of ICT in the selected hotels, which factors determine the adoption and the use of the internet in the selected hotels and what hotels will gain from the use of the internet.

1.1.3 Objectives of the study

The main objective of the study is to examine the importance of ICT in quality service delivery in the accommodation sector of Ghana's tourism industry.

The specific objectives of the study are:

- i. To identify the various applications of ICT in the accommodation sector.
- ii. To find out how ICT application affect the operators in the sector.
- iii. To determine the problems and challenges involved in the use of information technology in the hotel.

1.1.4 Significance of the study

This research will help and contribute in diverse ways. Primarily, it will help know the relevance of ICT in the delivery of service in the accommodation sector. It will also help managers of various hotels to understand why the internet is a key source off business in the present affairs and the future, which will make this study, present an opportunity for further research in this area. In addition, this research aims at encouraging managers of hotels to use ICT in delivering quality service.

1.1.5 The study area

1.1.5.1 Geographical boundaries with other districts

The Cape Coast Metropolis is bounded on the south by the Gulf of Guinea, west by the Komenda / Edina / Eguafo / Abrem Municipal Area, east by the Abura / Asebu / Kwamankese District and north by the Twifu / Hemang / Lower Denkyira District. The Municipality covers an area of 122 square kilometres and is the smallest metropolis in the country. The capital, Cape Coast, is also the capital of the Central Region (ghanadistricts.com)

1.1.5.2 Population and settlement patterns

The Cape Coast Metropolitan Assembly area is synonymous with a City District. This is because Cape Coast is the most populous settlement in the district with a hierarchy of functions that make it the nerve centre of economic activity for both the district and the region. About 6% of settlements in the Municipal Area including Cape Coast, Ekon and Nkanfoa and Kakomdo account for nearly 85% of the population of the entire district. Out of the 71 settlements in the Municipal area, 54 or 76% of them have population less than 1,000 persons and account for only 10% of the district's population. Thirty of the settlements (43%) have population less than 100 persons (ghanadistricts.com)

1.1.5.3 Housing

Housing is relatively a number one problem, which the CCMA needs to tackle tactfully, promptly and efficiently to enable the municipality and the entire Central Region to be abreast with time. Residential land area constitutes a sizeable portion of the land use of the Municipality. Some of such areas are Ola Estates, which has most of the hotels in Cape Coast, Greenhill and Pedu Estate.

However, there are distinct variations in housing quality among the various residential areas. The first class residential areas are mostly located in land areas that are state owned. These substantial residential areas, including the Ridges, the University of Cape Coast and the various estates developed by the State Housing Company (SHC) Limited are better serviced with relatively good roads, adequate power supply and good water services. Plot sizes are large with good landscape designs as well as clean environment and are more conducive for hotels.

This is to be contrasted with the older parts of the municipality as well as the rural areas where unsatisfactory. The telecommunication facilities. Plot sizes are very small and characterized by unplanned development, high state of disrepair and dirty surroundings. Most of the structures have outlived their age and purposes and are now blight to the surrounding areas. These have largely been the domain and habitation of the poor and require upgrading through sound planning and infrastructural provisions.

It is believed that the Social Security and National Insurance Trust (SSNIT) Housing Project for workers at the neighbouring Komenda-Edina-Eguafo-Abrem District would go a long way towards ameliorating the current housing problem facing the Assembly.

However, the vision of the CCMA is to attract private sector partnership for accelerated growth of the housing industry. The State Housing Company (SHC) intends to provide more houses environmental conditions generally of low quality poorly are and are areas are serviced in terms of water, power and affordable and alternative forms of housing, particularly for the Municipality's ever-rowing population. (ghanadistricts.com)

1.1.5.4 Tourism attractions in the metropolitan area

Ghana's stocks of historic and traditional buildings are the best in Sub-Saharan Africa. These monuments are protected by legislation, and are properly cared for by the GMMB, in whose custody they are. Of those national monuments, two groups have been designated by UNESCO, under the World Heritage Convention [to which Ghana was one of the first African countries to subscribe], as World Heritage Monuments.

Of all the cities and towns of Ghana, Cape Coast, the capital of the Gold Coast colony until 1877, has the most extensive surviving historic core of pre- 1900 building, and the greatest potential for revitalization and economic regeneration through repair, rehabilitation, and where necessary, reconstruction, of the existing building stock. A visual survey carried out some years ago, in association with the Urban Conservation Study commissioned by CEDECOM from the Department of Architecture of UST, Kumasi, identified about 750 no longer habitable rooms in the existing housing stock in the historic core. These rooms, contained within Beulah Lane, Aboom Road, Aboom Wells, Kotokuraba Road, Ashanti Road, Sam Road, and the

coastline between the Town hall and Amanful Methodist church.

The Central Region in general has a comparative advantage in tourism potential. This is seen mainly in heritage tourism, including the following:

Historical heritage forts and castles along its coastal line, Ancient traditions, festivals and artisan products, Unique natural heritage of pristine ecological systems that have been preserved as National Parks for eco-tourism promotion, e.g. the Kakum National Park.

The Cape Coast Municipal Area is fortunate to be the central focus of all tourist activities of the Central Region. Either activities emanate from Cape Coast or they end in Cape Coast resulting in the improvement of the local economy through tourist expenditure.

2.1 Literature review

Digital technologies have been claimed by many commentators to be the backbone of the tourism industry (Wong 2001: McCann 2001; Applebee *et al*, 2000; Connolly and Olsen 2011) [20, 12, 2, 9] and accommodation is no exception to this rule. ICT is seen as a vital, and often somewhat overlooked, element that shapes and underpins management of operations, human resources, sales and marketing and accounting and finance.

This chapter concentrates on reviewing the relevant literature on the importance of 1CT in the accommodation sector. The topics that will be covered are use of ICT in accommodation sector, advantages of the adoption of ICT application in the accommodation sector, how ICT application affect the operators in the accommodation sector and the problems associated with the use of ICT to the accommodation sector.

2.2 The use of ICT in accommodation

The use of ICT in hospitality operations is a fashionable subject amongst hospitality researchers. The most common technologies used for hotel management purposes are telephones, faxes and desktop or portable computers. In larger hotels, peripherals are usually connected to a central unit. The more advanced Property Management Systems provide seamless connections between different elements of a hotel's operations and create links into external communication networks such as GDS and CRS and even the Internet (Anon., 2002a; Milne and Ateljevic 2001; Brotherton and Turner 2001; Chio and Kimes 2002) [3, 21, 5, 8]. Many of these authors recognise the use of ICT in the following areas of accommodation operations:

- Front office functions reservation, registration, checkout; individual, delegate, walk in and 'house' account folios are all monitored and updated automatically:
- Housekeeping tracking and maintaining the physical status of rooms. Energy management systems have also been built into current day PMS;
- Back office accounting front office revenues update back office revenue journals. Accounts payable is integrated with the general ledger.

The Internet is also playing a growing role in the tourism industry as sales and marketing force, and lodging is no exception to the trend (Aksu, 2002; Piccoli, 2001) [1, 16]. There is now the need for the web, since numbers of consumers turn to the net for travel information and booking. ICT can be used to market the hotel in

advertisement, to promote the hotel and to improve the services of the hotel, which will enhance the high patronage of the hotel since foreigners or tourists, who patronize hotels, may want to use the internet to make some transactions.

2.3 Advantages of the adoption of ict application in the accommodation sector

The adoption of ICT will really benefit the accommodation sector in many ways, the front office will find it easy and interesting working with clients with regards to the telephone and the email, that is, clients making reservations via the internet and on the telephone. Buhalis (2003, 311) [7] claims that the real benefit of ICT lies in the linking and reconfiguring of business and organizational functions, resulting in a lowering of operational costs, improved communications with stakeholders and the ability to operate internationally. ICT is also playing a role in changing the way in which service quality is monitored (Lee *et al*, 2003) [11]

ICT in other ways also helps to offer management the chance to maximize effective interaction with employees (Buhalis, 1999; Teare, 2002) ^[6, 18]. Owing to the above, authors make us understand that not only does ICT give hoteliers easy access to the web, ICT also gives hoteliers the opportunity to have good interactions with their staff even though they can always communicate well without the internet and also helps them to monitor their business.

ICT will also make customers smile always because they will not walk to the front office to make reservation and bookings, but can always check the net to do that to save their breathe and money.

ICT can foster a higher degree of interaction between stakeholders through an Internet presence, email, electronic discussion groups and teleconferencing. Such networking and linkage information offers the opportunity to realise enormous benefits (Nodder 2003; Nodder et al 2003b) [14-15]. It 1S important that operators of various hotels adopt the use of ICT because of its advantages such as; enhancing work in the hotel and relieving clients from the hustle and bustle they will go through of making booking. It is also important that operators embrace the use of ICT so that they will not only make adverts on radio and televisions, but can advertise their hotel on the internet. The internet also will help operators of the hotels to get suppliers of goods that the hotel needs, e.g. modern laundry machines, water heaters industrial irons etc. Finally, the internet will also help the operators to keep the pace with the fast moving market and always upgrade the mode of service delivery in the hotel.

2.4 How ict application affects the operators in the accommodation sector

The use of ICT helps the operators of various hotels operate internationally. It is important that operators adapt the use of ICT so that they can interact with their staff when they are not in the hotel and also communicate with their clients for feedback of services being rendered to them. Also, ICT will make operators or owners of hotels know the status of the hotel and as well be updated on what needs to be done to upgrade the hotel ICT offers a range of opportunities to improve the training and communications environment within a hotel. New interfaces, simulation of real life situations, and access to networked training software all offer management the chance to maximize effective

interaction with employees (Buhalis, 1999; Teare, 2002) ^[6, 18]. The above reviews in silent on the fact that ICT can affect the operators of hotels negatively since the internet will not be there always due to for instance an "off line" mode that may occur in the course of rendering services.

2.5 Problems associated with the use of ict in the accommodation sector

Milev and Marsh (1988) [3] have enumerated some of the risks involved in ICT implementation.

According to them, limited capital, the pace of technological change, the lack of suitable software and the inability to afford a specialist person on staff are all-important factors. They also add that it is very difficult for the owners or operators of small hospitality businesses to find the time and energy to upgrade their skills on a regular basis. Milev and Marsh (1998) [3] also identify the perceived risk of losing control of the process when using external contractors.

Indeed in some cases, the biggest barrier to the use of the Internet is the risk of competitors gaining unauthorized access to business information. The offline' problems associated with the use of ICT is also one problem that operators may face. These may lead to frustrations by clients as well as the employees of the hotel.

3. Methodology

This chapter looks at the various methods used in the study and captures how data were collected, the sources of data, study population, sampling techniques, field work and rate of response in data collection.

3.2 Sources of data

Data were collected from both primary and secondary data sources. The mode of collecting data from primary source was the use of questionnaires. The secondary data were also obtained from literature written by other authors to support the primary data.

3.3 Study population

The study was conducted within the Cape Coast Metropolis, Central Region. The target population of the study consisted of operators and in-house guests of some selected hotels in Cape Coast

3.4 Sample size

Since not all the hotels could be used due to time constraint, 10 hotels were selected to represent all the hotels in Cape Coast. Two (2) questionnaires were given to guests and one (1) questionnaire to the hotel operators in each of the selected hotels.

3.5 Instruments for data collection

Questionnaires were the main source of data gathering instruments. The questionnaires designed to collect the data had fourteen (14) questions with three (3) open-ended questions for the guests and twelve (12) questions for the operators.

3.6 Administration of questionnaires

In all, thirty (30) questionnaires were administered. Out of the thirty (30), ten (10) were given to the hotel operators, and twenty (20) to the guests. The questionnaires were personally administered.

3.7 Data analysis techniques

The data analysis techniques that were used were bar charts and frequency tables, which were generated from the use of the SPSS (Statistical Package for Social Sciences) computer programme. Statistics such as the counts and percentages were largely employed to describe patterns revealed by the data.

3.8 Limitations of the study

During the collection of primary data, there were a number of factors that hindered the outcome of the study. The unwillingness of some respondents to fill the questionnaires due to their busy schedule led to some questionnaires unfilled. In addition, some of the hotels were a little reluctant to fill the questionnaires because they thought their personal information would be divulged, but after reading through the questionnaire, they realized it was not so personal.

4.1 Data presentation and analysis

This chapter has been divided into two sections. The first section will discuss the socio- demographic profiles of the respondents and the characteristics of the hotels used. The respondents were grouped into two distinct groups namely, operators of the selected hotels and the guests. The second section will attempt to draw meanings from the primary data collected in line with the set objectives of the study. The objectives were to find the various applications of ICT in the accommodation sector, how ICT applications affected the operators of the sector, and to determine the problems and challenges associated with the use of ICT in the accommodation sector. Overall, there were ten (10) hotels and nineteen

(19) Guests from the hotels who took part in the study. The list of the hotels and their characteristics are shown in Table 4.1 below.

Table 1: Hotels Used in the Survey

No.	No. Name of Hotel	Location	No. of Rooms	Rating
1	Cape Coast Hotel	Pedu	28	2-star
2	C-Lotte's Hotel	Aquarium	16	1-Star
3	Jubilee Lodge Hotel	Brofoyedur	13	1-Star
4	Nokaans Guest House	Pedu	17	1-Star
5	Prospect Lodge	Coronation	15	1-Star
6	Marnico Guest House	Ayifua	10	1-Star
7	Matlat Hotel	Pedu	32	1-Star
8	Jangles Hotel	Ayifua	16	Budget
9	Vec Hotel	Siwdo	10	Budget
10	Hacienda Hotel	Pedu		Budget

Source: Fieldwork, June 2022

This includes gender, age, level of education and nationality of guests (Table 4.2) as well as the position and length of service of the respondents representing the operators (Table 4.5). Table 4.2 shows that 680 of the guest respondents were between 20 to 29 years of age, 21% were aged between 30 to 39 and 11% were between 40 to 49 years old. Fifty-three percent (53%) were male and 47% were female. They were mostly Ghanaian guests with educational background ranging from secondary school, through HND to degree.

 Table 2: Characteristics of Guest Respondents

Characteristic	Categories	Frequency	Percent
age	20 to 29	13	68
	30 to 39	4	21
	40 to 49	2	11
	Total	19	100
Gender	Male	10	53
	female	9	47
	total	19	100
Nationality	Ghanaian	17	89
	Non Ghanaian	2	11
	Total	19	100
Educational background	Secondary school	8	42
	HND	6	32
	Degree	4	21
	Postgraduate	1	5
	Total	19	100

Source: Fieldwork, June 2022

For the operators, eight (8) of the respondents were Front Office Managers, one (1) was a Food and Beverage Manager and one (1) was a General Manager. They had working experience as managers ranging from one year to

five years, with one manager having 15 years working experience and another indicating his working experience as 8 months. These two are listed in Table 4.3 as "Others?

Table 3: Position and Years in Service of Respondents Representing Operators

Position and Y ears in Service		Frequency	Percent
	General Manager	1	10
Managarial position hold:	Front Office Manager	8	80
Managerial position held:	Food and Beverage Manager	1	10
	Total	10	100
	1 year	2	20
	2 years	1	10
	3 years	2	20
Years spent in position:	4 years	2	20
	5 years	1	10
	Others	2	20
	Total	10	100

Source: Fieldwork, June 2022

4.3 Applications of ICT in the hotels

The first objective of this research was to identify the various applications of ICT in the accommodation sector in Cape Coast. In achieving this, questions, which were meant for operators and in-house guests of the hotels to determine the various forms of ICT applications in the hotels, were posed.

4.3.1 Response from the operators on the various applications of ICT in the hotel

The Table 4.4 below shows the distribution of the operators' responses on ICT usage in their establishments, that is, if ICT was used in their hotels. From the table, 90%% of the operators used ICT in their establishments and 10% did not use ICT

Table 4: Whether ICT Was Used in the Hotels

Response	Frequency	Percent
Yes	9	90.0
no	1	10.0
Total	10.0	100.0

Source: Fieldwork, June 2022

Table 4.5 below indicates which forms of ICT were being used in the operator's establishments. The distribution illustrates that all (100%) of the hotels used telephone, 40%

used the internet, and none used Property Management System or any other ICT facility. This means that 60% of the hotels used Telephone only and 40% used Telephone and Internet.

From this, it can be concluded that the Telephone was the most common ICT facility used in the hotels. The Internet was used to a less degree, perhaps due to cost and technical Challenges. It was surprising that none of the hotels used Property Management System.

5.1 Summary, conclusions and recommendations

This section is the last chapter of the research on importance of ICT in the accommodation sector with some selected hotels in Cape Coast. This chapter consists of the following areas:

Summary, findings of the study, recommendations to the findings of the study and conclusions

5.2 Summary of findings

The main objective of the study was to examine the importance of ICT in the accommodation sector of Ghana's tourism industry, focusing on ten selected hotels in Cape Coast Metropolis.

This objective was achieved through three sub-objectives, which were to find out the various applications of ICT in the hotels, how ICT usage affected the operators of these hotels,

and to determine the problems and challenges associated with the use of ICT in the hotels. Data were obtained through questionnaire survey administered to the managers of the ten hotels together with two guests each from these hotels numbering up to 19. The responses of a total sample size of 29 respondents were analyzed with the aid of the SPSS computer application.

The analysis revealed some findings the major ones of which were as follows:

First, the study revealed that ICT was used in all the ten hotels and the forms used were telephone and internet. It was revealed that all the ten hotels used the telephone, but 60% of them used only telephone while the other 40% used the internet as well. It was also found that 68% of the guests used Telephone, 16% used Internet and 16% did not use any ICT facility in their hotels.

It was also found out that ICT affected the hotel operators in some ways. 40.0% of the hotel operators were affected by ICT while 50% of the operators were not affected by ICT. It was also found out that ICT affected the hotels by helping 10% of them to market their hotel, another 10% to get feedback from guests, and made 30% of them to deliver service quickly.

This research discovered that there were some problems that hotel operators and guests encountered with the use of 1CT. On the part of operators, it was found that 30% of them alluded to slow network, 20% talked about offline mode, and 10% each pointed to absence of network and poor reception respectively as digital technology challenges they faced which their guests complained to them about. For the guests, 5% of them had problems with slow network, 5% encountered offline mode problems and 37% encountered network failure problems related with the use of digital technology.

6. Conclusions

From the above findings, the following conclusions can be drawn from the study:

It can be concluded that ICT is not significantly used in the accommodation sector in Cape Coast. The Telephone was the most common ICT facility used in the hotels. The internet was used to a less degree, perhaps due to cost and technical challenges. It was surprising that none of the hotels used Property Management System. It can also be concluded that a greater number of guests of hotels in Cape Coast use the telephone.

Majority of the hotel operators in Cape Coast are not influenced by the usage of digital technology. Quick service delivery was the most significant effect of 1CT in the accommodation sector in Cape Coast.

The most common digital technology challenge facing the operators was slow network. The most common problem guest's encounter in the accommodation sector in Cape Coast is network failure.

7. Recommendations

Based on the findings and conclusions of this study, the following recommendations are given:

The hotels should adapt to the changes in modernization. ICT will help hotel operators market their hotels very well since majority of Ghanaians have adapted to the use of ICT and marketing the hotel can be internationally promoted as well, it will do them good to sign on to ICT in full blown fashion.

ICT usage can lure guests to the hotel and can as well make operators of hotels loose customers. This is to say that when the internet is always breaking and giving guests problems, guests can decide not to return to the facility. Therefore, for that reason, the hotel operators must make it a point to ensure fast and reliable internet connections in their hotels to retain their customers.

Furthermore, hotel operators must realise the importance of ICT in the hotels so that they give it much attention for quality service delivery.

8. References

- 1. Aksu A. The Internet and five-star hotels: A case study from the Assntalya region in Turkey, International Journal of Contemporary Hospitality Management. 2002;14(2):94.
- 2. Applebee A, Ritchie BW, Dermoor S, Cressy A. The ACT tourism industry internet study: Perceptions, attitudes and adoption, Centre for Tourism Research, University of Canberra, Australia; c2000.
- 3. Anon. Taking a virtual approach to hospitality management, Training strategies for Tomorrow. 2002a;16(5):9-11.
- 4. Atelievic J, Milne S. Researching small tourism enterprises: Encountering complexity in New Zealand; c2004.
- 5. Brotherton B, Turner R. Introducing yield management systems in hotels: getting the technical / human balance right, Journal of Services Management Research. 2001;1(2):25-47.
- Buhalis D. The cost and benefits of information technology and the Internet for small and medium-sized tourism enterprises, in Buhalis, D. and Schertler, W (eds) Digital technologies in Tourism, Proceedings of the ENTER 1999 Conference, New York: Springer-Wein; c1999. p. 218-27.
- Buhalis D. eTourism: Information technology for strategic tourism management, Essex: Prentice Hall; c2003.
- 8. Chio S, Kimes SL. Electronic Distribution Channels Effect on Hotel Revenue Management, Cornell Hotel and Restaurant Quarterly. 2002;43(3):23-31.
- Connolly DJ, Olsen MD. An environmental assessment of how technology is reshaping the hospitality industry, Tourism and Hospitality Ghana Tourism Authority; c2011.
- 10. Ghana Tourist Board; c2007.
- 11. Lee S, Barker S, Kandampully J. Technology, service quality and customer loyalty in hotels: Australian managerial perspectives, Managing Service Quality. 2003;13(5):423-432.
- 12. McCann J. Hoteliers find saving, efficiency in HR/payroll software, Hotel & Motel Management; c2001 p. 72-73.
- 13. Milev NN, Marsh AE. Small businesses and information technology: Risk Planning and change, Journal of Small Business and Enterprise Development. 1998;5(3):228-245.
- 14. Nodder C. Small tourism enterprises and ICT: Adoption issues in Auckland, New Zealand, Unpublished Master of Computing thesis: Unitec New Zealand; c2003.
- Nodder C, Cate N, Slater K, Milne S. ICT, Local government and Tourism development: Cases from Auckland, New Zealand, In N. Mistilis (Ed.) Digital

- technologies in Tourism Australia 2003, proceedings of the Tourism Technology Futures Forum, Queensland, Australia, 2003, Mudjimba, Queensland; c2003b. p. 22-25.
- 16. Piccoli G. The customer-service life cycle: A framework for improving customer service through information technology, Cornell Hotel and Restaurant Administration Quarterly. 2001;42(3):38-46.
- 17. Robbinson J. International comparisons of productivity growth: the role of information technology and regulatory practices, Labour Economics; c1979.
- 18. Teare T. Capturing organizational learning, International Journal of Contemporary Hospitality Management. 2002;14(7):354.
- 19. Weaver D, Opperman M. Tourism Management, John Wiley and sons, Australia, (Brisbane), (ISBN 0471341258); c2000.
- 20. Wong KKF. An analysis of the competitive strategies of hotels and travel agents in Hong Kong and Singapore, International Journal of Contemporary Hospitality Management. 2001;13(6):293-304.
- 21. Milne S, Ateljevic I. Tourism, economic development and the global-local nexus: Theory embracing complexity. Tourism geographies. 2001 Jan 1;3(4):369-93. www.ghanadistricts.com.