INFLUENCE OF MODERN INFORMATION TECHNOLOGY DEVICES USAGE ON FAMILY INTERACTION IN ADAMAWA STATE

BY

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JUNE, 2011

DECLARATION

I declare that the work in the Thesis titled: **"INFLUENCE OF MODERN INFORMATION TECHNOLOGY DEVICES USAGE ON FAMILY INTERACTION IN ADAMWA STATE"** has been carried out by me in the Department of Vocational and Technical Education, Faculty of Education, under the supervision Dr. (Mrs) E. Ike and Dr. (Mrs) P. E. Onuigbo. The information derived from the literature has been duly acknowledged in the text and a list of references provided. This Thesis has not been previously presented at any university or its equivalent.

_____	_____	_____
Name of Student	Signature	Date

CERTIFICATION

The Thesis titled: **"INFLUENCE OF MODERN INFORMATION TECHNOLOGY DEVICES USAGE ON FAMILY INTERACTION IN ADAMWA STATE"** by Filibus, Feredeino Sarah, meets the regulations governing the award of the degree of Masters in Education (M.Ed) Vocational Technical Education (Home Economics) of Ahmadu Bello University, Zaria and is approved for its contribution to knowledge and literary presentation

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DEDICATION

I dedicate this research work to God Almighty for his healing mercy and to the memory of my late parents Pa Tertius A. Lagwampa and my Mother Beriah Tertius.

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Carrying out a research of this nature is not a one man's business. Many people are involved. I want to use this medium to acknowledge the immerse contribution of others to the success of this Thesis.

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ABSTRACT

This study was designed to examine the Influence of Modern Information Technology (MIT) Devices Usage on Family Interaction in Adamawa State. In this study, six objectives were raised and six research questions were answered, four null hypotheses were formulated. Survey research design was adopted. Population for the study was 6,108 staff and their children in tertiary institutions. A purposive sampling technique was used with a sample frame of five hundred (500) adults (parents) and children. In one hundred and twenty five (125) households. The instrument used for data collection was questionnaire. The data collected were statistically analyzed using frequencies and percentages for the demographic data, mean and standard deviation for the research questions while Pearson Product Moment Correlation (PPMC) statistics was used to measure the significant relationship between the variables. The four null hypotheses were statistically tested at a significant level of 0.05 and it was observed that all four null hypotheses were rejected. This revealed that significant relationships existed between the influence of Modern Information Technology devices and family interactions and parents' action towards socialization of their children. The findings revealed that MIT devices usage could positively influence interaction among family members, they could also influence family togetherness, communication, as well as how parents socialize their children positively despite the presence of these devices in their homes. To summarise all these, both research questions and hypotheses showed that significant relationship exist between each of these variables and the use of modern information technology devices by the family members. Based on the findings, it was recommended that MIT devices should be found in every home, in order to encourage family time together and improve communication between members.

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OPERATIONAL DEFINITION OF TERMS

Influence: An effect that brings changes within an individual.

Family Interaction: Spending time together through working together watching TV, and discussing together.

Modern Information Technology (MIT): Current devices used in storing and passing information, which also is used for entertaining individuals or families, such as; personal computers, cabled television, cell phones and internet.

Surfing: Moving back and forth from one Internet Website to another.

CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

The family today benefits from the modern information technology devices. Through these devices such as cabled television, personal computer, cell phone (handset) and the internet, the family can watch and be connected to other parts of the world without physically being there. Families can interact with one another within and outside the home without any barrier. As good as these devices are, they have their other side effects on the family. There is a general public perception that MIT devices have both negative and positive influence on the family. Pope John Paul II, (1994) and Hildebrand, (1997) are of the view that MIT devices can enrich family life, as it draws them closer together. On the other hand, MIT can harm family life as it can isolate family members in their private world, cutting them off from authentic interpersonal relationships.

Nataraja, (2008) indicated that modern information technology (MIT) is a network that is sophisticated enough to meet the demands of modern communication. It is the present means of communication between individuals. He further explained that, from ancient writing techniques and newspapers, we have moved on to e-mail and text massages. From Morse code and telegraphs to telephones and radios, we now move to television, computers and cell phones. We no longer have to wait for days to receive information as most data massages can be transferred in a matter of second over a high-speed broadband internet connected with computers that boast Gigabytes of Rom and Gigahaetze of processor speed.

Modern information technology as stated by Hughes et al (1999) is becoming part of family life as the use of modern information technology devices continue to increase among families; it will also increasingly become part of the human culture. As such, MIT will continue to affect family life. In order words, MIT is becoming a significant part of family life. Frost (2006) in his view accepted that television and internet as the centre of Information Technology were potentials for changing human lives which have profoundly affected the lives of families and their children especially the youths.

MIT devices according to (Barbour, 2005) has certain personal use such as gambling, accessing chat lines, transmitting inappropriate jokes, subscribing to lists, news groups or chart groups, sending junk programs or mail, live pictures or graphics. These include computer games, music files and the accessing of radio or television station broadcasting via the internet and downloading of such files on the network.

The family is the first primary group that is met by an individual. It is the place where some of our most important identity take shape and socialization for children take place. Aldous and Dumon (1990) view the family as a cohabitating group of some duration, composed of persons in intimate relation based on biology law, custom or choice and usually economically independent. Thus, family is the hub of an institution in which two or more people are related by blood types, marriage, adoption and other rituals of incorporation. Degenova and Rice (2002) maintained that the family is a recognize unit that performs functions such as; procreating which contributes to a nations population, socialization of its members, economic roles, religious orientation, protection and affection for its members.

In a study identifying the effects of MIT devices on family and community, on the web site home web, English-Leuck (1998) postulated that the family is not a natural unit that simply exists, but one defined by action such as, watching television, camping, travelling, eating, and talking together, and with the end of phones, pagers, answering machines and other communication media interact together. These also help parents to keep in contact with their children.

Family interaction is the interpersonal dynamics of members of a family in a variety of environment and activities; face-to-face contact, telephone calls, letters, e-mail and text messaging. There have been impressive claims on the potential benefit of Information technology. On the other hand there is concern on the part of some citizens that changes impacted by MIT, embody potential risk to family, individual freedoms and economic interest. Some researchers such as Hildebrand (1997) and Sasse (1997) observed the interceptions of modern technology and the family in variety of ways affirms that technology has a very important influence on the families as they have right to interact, which enhances their attachment to each other.

The issue of MIT devices and family has been viewed from different writers at different time and situations. This has always been as a result of their perception on the influence of MIT on family interaction. The issue of interaction as perceived by families in Adamawa State, warrant for an investigation about the ways that MIT devices is altering interaction among family members. As families increasingly spend more time using MIT devices in their homes, face to face interaction will likely be affected. This study will investigate the influence of modern information technology (MIT) on family interaction in Adamawa State. When modern information technology

is mentioned in this study, it is a reference to cable television, personal computer, cell phone and the internet. To look beyond these although important, is beyond the scope of this study.

Family interactions primarily takes place in the home so the investigation of "family perception on the influence of modern information technology in Adamawa state" is the primary target for the study, families with at least two MIT devices, including some combination of video cassettes recorder (VCR), Compact Disk, Lesser Disk, Fax machine, Voice mail services will be the target for the study.

1.2 Statement of the Problem

The influence of modern information technology on the degree of interaction among members of the family as observed by the researcher is undoubtedly tremendous. Modern information technology is a powerful tool for socialization as well as domination. It holds superiority over family relationships. The researcher observes that almost every household has one or more modern information technology device, which she observes has deprived families of norms, values, attitudes and behaviours, some of which would have been appreciated in the past. The presence of modern information technology devices have deprived families of face to face communication as they use one or more of these devices to communicate. The amount of time families spend together has become minimal as some members keep to themselves when using or operating one of the devices, for instance, the researcher on a visit to a family discovered that the head of that family was so absorbed in using a cable television and was not paying attention to members of his household. Based on

the researcher's experiences and personal observation, modern information technology has brought about changes in child-rearing practices.

Marriage institution has become functional rather than romantic as spouses interact more with the devices available than with each other. In the same vain modern information technology such as television, computers and the internet is a force in creating socio-cultural changes that diffuse cultures. It makes other people use western culture which is dominant with some information devices used. For instance, increase verbal responsiveness between parents and children as in the west has given room to children using vulgar or abusive languages while speaking to their parents. Parents have left the socialization of their children to what they see and hear from the information technology devices. They do not correct or explain what the children see or hear from MIT devices. Children are left on their own to watch and digest what they see or hear as long as they like.

The researcher also notes that most literatures are views of writers and researchers in the developed countries, such as America, Europe and Great Britain. For instance, Cooley (1992) is of the view that modern information technology has negative influences on domestic relationship between family members, while Pope John Paul II (1994) and Sasse (1997) believe that it has positive influence as it improves family communication and enrich family life. The question here is, what is happening in developing countries such as Nigeria? Thus, the reason for the study, to investigate the influence of modern information technology on family interaction in Adamawa State.

1.3 Objectives of Study

The overview of the study was to determine the influence of modern information technology devices on family interactions in Adamawa State.

The specific objectives are to:

1. identify the types and reasons for which families use modern information technology devices in their homes in Adamawa State.
2. determine the time family members spend inside and out side the home using MIT devices.
3. establish the influence of MIT devices used on family interaction.
4. determine the influence of MIT on family communication and time spent together.
5. access the influence of MIT devices usage on the socialization of children by parents.

1.4 Research Questions

The research questions for this study are:

1a. What are the types of MIT used by families in Adamawa State?

1b. What are the reasons for MIT usage by families in Adamawa State?

2a. How much time do family members spend outside and inside the home using MIT devices?

2b. What influence does MIT devices usage have on families time together?

3. What are the influences of MIT devices on family interaction in Adamawa State?
4. What is the influence of modern information technology devices on family communication?
5. To what extent do MIT devices usage influence parents' action towards socialization of children in Adamawa State?

1.5 Null Hypotheses

The following null hypotheses have been postulated for the study:

1. There is no significant relationship between Modern Information Technology devices usage and interaction among family members.
2. There is no significant relationship between the influence of Modern Information Technology usage and family togetherness socialization and communication).
3. There is no significant relationship between the influence of Modern Information Technology usage and family communication.
4. There is no significant relationship between the influence of Modern Information Technology use and parents' actions towards socialization of children in the family.

1.6 Basic Assumptions

The research is based on the following assumptions:

In Adamawa State many modern information technology devices are used and this has brought transformation on family interaction, it is therefore important to identify the direction of that transformation.

i. Families have different ways of utilizing the modern information technology gadgets in their homes.

ii. Modern information technology has affected communication among family members.

iii. Modern information technology has negatively affected interaction within the family.

iv. Socialization confined to parents have been shifted to modern information technology.

1.7 Significance of the Study

Although there have been much research work, discussion and a lot of essays on the potential implications of information technology on social life of families, this researcher views it important to investigates the influence of modern information technology particularly on family interaction in Adamawa State.

The result of this study will help families to:

- regulate the type of Modern information technology to be used by her members.
- regulate the amount of time to be spent in the use of Modern information technology.
- The study will be of benefit in the area of curriculum as it would help curriculum planners in curriculum innovation, and development in the area of Home Economics.

- The study will also be of benefit to Governmental and Non-governmental organizations who would wish to educate parents and children on the influence of information technology.
- The study will be of benefit to researchers or students that may wish to make further investigations on MIT devices.
- The study will expose members of the family to both negative and positive practices connected to some modern information technology devices found in our society that affects or influences the standard or values of the family.

1.8 Scope of the Study

The focus of this study were parents and children between the ages of 12-21 years in some households in seven tertiary institutions within Adamawa State.

The study was delimited to the following modern information technology devices:

i. Cellular phone

ii. Cable television

iii. Internet

iv. Personal computer.

These devices are known to have influence on the family. This study is concern with the investigation on the role of MIT on family interaction such as, communication, family time together and the socialization of children. The study is delimited to the social life of the family and not on economic or socio-economic life of the family.

CHAPTER TWO

REVIEW OF RELATED LITERATURE

In this chapter the researcher reviewed related literature under the following sub-headings:

2.1 Concept of Family

2.1.1 Family Relationship

2.1.2 Structure and Functions of the Family

2.2 Concepts and Components of MIT

2.2.1 Concepts of Modern Information Technology

2.2.2 Information Technology Devices

2.3 Influence of Modern Information Technology on Family

2.3.1 Influence of Modern Information Technology on Family Interaction

2.3.2 Influence of Modern Information Technology on Family's Time Spent Together

2.3.3 Influence of Modern Information Technology on Family Communication

2.3.4 Influence of Modern Information Technology on Parents Attitude towards Socialization of children

2.4 Empirical Studies Related to Modern Information Technology and Family Interaction

2.5 Summary of Related Review of Literature

2.1 Concept of Family

The family is the most remarkable of all man's social institutions. No other social institution is older, and none is more universal than the family in all times and

in all places. It has been found that certain societal imperatives can most effectively be met through the institutionalization of marriage and family. Family institution concerns itself with love, sexual relationships, marriage, reproduction and childbearing, socialization of the child, status and roles involved in the kinship organization (William, 1991).

The word 'family', according to Balaba (1999) differs from place to place. In industrialized countries the family is constituted of a man, a wife and their children, while in developing countries, particularly in Africa, the family is made up of a man, his wife or wives, children and a number of their close blood relations in the same household. The author further ascertains that the family is aimed at ensuring the survival, protection and development of children, and to support each other morally, socially and economically.

Burges and Locke as cited by Olaitan (2003) defined family as a group of person united by ties of marriage, blood, adoption, constituting a single household; interacting and communicating with each other in their respective social roles and creating and maintaining a common culture. Duval (1971) defines family as a unit of interacting persons related by ties of marriage, birth or adoption, whose central purpose is to maintain a common culture, which promotes physical, mental, emotional and social development of each of its members. This definition of family agrees with Hildebrand (1997) and Cherlin (2002) who stated in the U.S. Bureau of census: "that a family is two or more persons, living in the same household, and related by blood, marriage, or adoption". Relationship by blood they explain, means sharing a common ancestor, including cross-generational kinship ties such as parents and child (whose

common ancestors are parents' parents) or same-generation ties such as brother and sister (whose common ancestors are their parents). The above definitions include a married couple with or without children as well as an unmarried mother and her child (who are related by blood or adoption).

American Heritage Dictionary (2006) crowns up the definition of family in the following four ways:

i. A fundamental social group in a society consisting of a man and woman and their children.

ii. A group of people sharing common ancestry.

iii. Lineage, especially distinguished lineage.

iv. All members of household under one roof.

2.1.1 Family Relationship

Family relationships are relationships that exist between family members, these relationships are long and lasting. There are different forms of relationship within the family. Anyakoha and Eluwa (1991) classified family relationship into: -

a. Husband-wife relationship: This is strengthened through effective communication, affection companionship and sex relationship.

b. Parents-child relationship: This can be broken into:

i. Protection-dependence relationship.

ii. Instruction-learning relationship.

iii. Enjoyment-companionship relationship.

iv. Advising-evaluation relationship.

This classification makes it possible to see the ways parents and children relates to each other.

c. Brother-sister or sibling relationship: Exist through, companionship, helping each other, checking each other on manners and etiquette; they also give each other security, understanding and support against adults.

Types of relationships that a family has with relatives, friends, and neighbours can influence the family's social and emotional life (Hildebrand, 1997).

2.1.2 Structure and Functions of the Family

There are various types of family structure that exist in the society. Hildebrand (1997) listed the following, as types of family structure:

Nuclear Family: This is a family that consists of a mother, a father, and one or more children. The children may be biological or adopted. In this type of family, two people share the parenting responsibilities. The parents usually have more time to spend with the children. If both parents work outside the home, they can also share financial responsibilities.

Extended Family: This is made up of all the grandparents, aunts, uncles and cousins.

Single Parent Family: This consist of only one parent and one or more children. Some single-parent families result from legal separation, desertion, or divorce. Others are due to death of one parent. Still others are the result of unmarried people becoming parents through birth or adoption.

Blended Family: This consists of two parents one or both of who have children from a previous relationship. Each becomes a stepparent to the other's children. The children

become stepbrothers or sisters. If the parents then have a child of their own, the children from the previous marriages are half brothers and half sisters to the new child.

Cooperative Family: The cooperative family consists of non related people who get together to rear their children in one household. They share living expenses and household chores. They also share the responsibilities of caring for children.

Family without children: A married couple without children is also considered to have family. Some couples are unable to have children; others choose to remain childless.

Functions of Family

Olaitan (2003) enumerated the following, as the functions of the family:

a. Socialization functions: As soon as a child is born, the parents start training him through care to make him adjust to his environment.

b. Training in sex roles: Children at home learn through imitation. They like to play the role of parents most of the time. As they grow up, they learn to identify the roles that are applicable to their sexes. The boy imitates his father and the girl her mother. The boy learns through his father and the girl from her mother.

c. Family as provider of privacy: Family members place great priority on their homes and decide on what should be kept in the home. They also decide on who should be allowed to enter into certain places in the home. Members feel more relaxed and happy with the arrangements and designations in the family home. Every member of the family therefore provides security and respect to the privacy of the individual in the family.

d. The archival function of the family: There are certain practices, events, objects, norms, and rituals that are highly valued by individual African family. The family therefore struggles to keep or preserve these values and hand them over to the members of the family with acceptable identity. These members are also expected to protect these things as unique properties of the family and hand them over to future members with similar identity.

e. Family as Provider of Freedom: It is when a child gets out of the family home, to join other organization or clubs that he appreciates the freedom provided by the home. They organization or institutions may have rigid rules to obey with clear sanctions when they are disobeyed. This environment differs from his family home where he was free to behave the way the family wants.

Other functions of the family according to Hildebrand (1997) are:-

- Providing emotional support: This is the heart of the role of families. The family members offer each other affection and companionship.
- Providing economic support: In this case, the family satisfies the economic needs of its members.
- Providing childcare and guidance is another function of the family. This is also called 'parenting'. Parenting requires keeping children physically, and psychologically safe. It involved teaching children many roles, both formally and informally. It also involves teaching behaviours, skills, and information that children must learn to function adequately in the world outside the family.

- Providing recreation: This includes non-work activities done for relaxation, fun, and self-development to most families because it provides time for family members to play, laugh and relax together.
- Religious orientation: The family is where the child learns how to pray and worship. Therefore, families are expected to teach their children how to serve their God, as they inculcate in them the fear and believe in God (James, 2001).

Olson, (2000) observes that, families share three major clusters of qualities: cohesion, flexibility and communication.

Family cohesion involved commitment and spending time together: Commitment to the family includes trust, honesty, dependability and faithfulness. Spending time together means committing a considerable amount of quality time to sharing activities, feelings, ideas and enjoying each others company. If time is spent all the time in front of television, the quality time may be lost or if one spends time fixed on the electronic game with all the concentration, family time can be jeopardized.

Family Flexibility: Relates to dealing effectively with stress and having helpful spiritual beliefs, coping abilities which include using personal and family resources to help each other, accepting crises as challenges rather than denying them, and growing together by working through crises. Spiritual well-being includes happiness, optimism, hope, faith, and a set of shared ethical values that guide family members through life's challenges.

Family Communication: Focuses on positive communication and on appreciating and having affection for family members. Positive communication includes having open, straight forward discussions, being cooperative rather than competitive, and sharing

feelings with one another. Appreciation and affection include kindness, mutual caring, respect for individuality, and a feeling of security.

2.2 Concept and Component of Modern Information Technology

Information in the past according to micro soft Encyclopaedia (2004) has been handled by a variety of techniques. These techniques were used in sending out simple message, for instance signals that could be seen or heard over a short distance. (Barron 1979, Kumuyi 2006) listed some techniques as drum beat, fire and smoke, or lanterns beacons. Man later used messages. Barron (1979) further writes on the transition from the early techniques for sending and storing of messages when he stated that in the past, the medium for foreign information was the paper, while the post and telephones were used as transmission systems. Input –output equipment ranges from guill pens to the typewriter, and the most common processing device is the brain".

The technique through which information is handled has undergone a transformation. From the use of ancient writing, newspapers, rotary phones, black and white television, typewriter to what is being referred to as new or modern information technology. The black and white televisions are now flat screen with thousands of lines that give clear images and millions of colours to every small area on the screen. The rotary phones have been transformed to portable phones and to satellite communication cellular phones. The hand written letters and numbers are at present digitally transferred. Information no longer wait for days to be received, as most data messages can be transferred in a matter of seconds over high speed internet connections with computers (Nataraja, 2008).

2.2.1 Concepts of Modern Information Technology

Information technology is the use of electric gadgets for storing, protecting, processing, transmitting of information and later retrieving information. It is also used to analyze and sent out information. Information technology devices includes:

- Computers, such as desktop or potable computers or servers connected to network.
- Electronic data inter change: i.e. exchange of computer-based information over a data circuit.
- E-mail (Electronic mail) refers to a computer-based message sent over a communication network.
- Facsimile this is a communication device that converts each picture elements of black and white in to an electric signal.

Other modern information technology devices commonly used are radio and cable television. Radio refers to wireless electromagnetic wave used in sending out, and receiving messages through the air, while television is an electrical equipment with a screen on which one can watch programmes broadcast-satellite (DBS) services allow individual households to receive hundreds of channels carried by satellites directly in to their homes.

The advent and growth of modern information and communication technology and the growing convergence of all media made possible by advances in this technology have had a major impact on the media. With the spread of satellites communication and the introduction of previously introduced numbers of channels in

many countries, the enormous power of the media hasps influence ideas and behaviours at all levels of the society.

Internet: enables electronic networking, webs databases information centers, web television, video conferencing, CD ROMs. And other technological innovations serve to broaden the accessibility and reach of the media (Hafkin 2002)

Modern Information Technology, according to Barron (1979) includes the processing of information (which is currently performed by computers or manual methods), the storage of information (which is currently largely non-electronic) and the communication of information (which is current performed by voice, telecommunications and postal services). This statement is supported by Robson (1997) who described modern information technology as all the machines and software or "kit" concern with capture, storage, transmittal or presentation of information. Simply put, it is the gathering, recording and communication of information, which can be computerized, or electronized (Lievrouw, 2004). He further stated that MIT include all matters concerned with the furtherance of computer science and technology and with the design, development, installation and implementation of information system and application.

Modern information technology is any equipment or interconnected system or subsystem of equipment, that is used in the automatic acquisition, storage, manipulation, management, movement, control, display, switching, interchange, transmission, or reception of data or information. The term modern information technology includes computer, ancillary equipment, software, firmware, and similar

procedures, services (including support services) and related resources. In support and its peripherals constitute the hardware (www /508 glossy. html).

Papert (1999) is of the view that Modern Information Technology has entered our lives over a relatively period of time with little warning and essentially no formal educational preparation for most people. Some applications of Modern Information Technology requires relatively little knowledge to use, other quite useful applications are accessible only to those who have some understanding of the underlying technology. Those with these understanding, perhaps because they are technologically trained, acquired it in connection with their work, or are simply curious, motivated and persisted enough to have figured it our on their own, have greater facility of operating in their digital world and thus have greater access to the benefits it offers.

Modern information technology includes all matters concerned with the furthermore of computer science and technology and with the design, development, installation, and implementation of information systems and applications. (www.ichnet.org/glossy.htm).

2.2.2 Information Technology Devices

Information technology devices include:

Internet

The Internet is an amazing invention. It is a useful tool that offers opportunities for learning, finding information, fun games, contacting friends by e-mail, shopping and for chatting to others with similar interests. However, the Internet is an adult

environment, with few limits on what is placed on it and where the information may not always be reliable; as such it can be a dangerous place for children to play.

Obrein (1996) is of the view that the Internet is the largest "network of networks" today, and the closest model we have to the information superhighway of tomorrow. The Internet is a rapidly growing global web of thousands of business, educational and research networks connecting millions of computers and their uses in over 100 countries to each other. The most popular Internet application is E-mail, which is fast, faster than many public network messages usually arrive in seconds or a few minutes anywhere in the world.

The Internet is a global network of computers linked together which are able to communicate through telephone line, cables and satellites. (http://www.netalert.net .au/). It is composed of many interconnected computer networks. Each network may link, tens hundreds, or even thousands of computers, enabling them to share information with one another. Comer (1993) explains that many individual use the internet for communicating through electronic mail (e-mail) for news and research information, shopping, paying bills and online banking. Educational institutions use the internet for research and to deliver courses and course material to students. Media and entertainment companies used the internet for online news and weather services and to broadcast audio and video, including live radio and television programmes. Use of the internet has grown tremendously since its inception. Comer (1993) noted that, the internet's success, arises from its flexibility. Instead of restricting components network to a particular type, internet technology allows interconnection of any kind of computer network. No network is too small or too large, too fast or two slow to be

interconnected. Thus, the internet includes in expensive network that can connect thousand of computers within a continents.

The Internet has made it possible for people all over the world to communicate directly with one another effectively and inexpensively. Unlike traditional broadcasting media, such as radio and television. The Internet has doubled in size since it began in the late 1970s. The current number can only be estimated. One survey found that there are 61 million Internet users worldwide at the end of 1996, 148 million at the end of 1998, and 407 million by the end of 2000 some analysts said that the number of user to double again by the end of 2002 (Douglas, 1993).

The Main Features of the Internet:

i. Chat lines: One person can talk to another by group of people by typing words on the computer.

ii. On-line video- use to view activities in other places as they happen. For example see what is happening in terms square in New York or on the NASA site, see the space's shuttle activity.

iii. E-mail (Electronic Mail) – an electronic form of sending a letter or document to another person. Massages can be typed, send to the person's e-mail address and arrive almost immediately on their computers. It is a system that is cheap, quick and widely use. It may be transmitted with attachment such as electronic such as electronic files containing text, graphics, images, digitized voice, digitized video or computer programmes.

iv. World Wide Web (WWW) – this is a massive collection of pages of information, pictures and games that can be accessed by any computer that is on-line.

v. Newsgroups – these are an electronic bulletin board that is accessed by using a similar screen to the email screen.

vi. Interactivity – this is like a two-way conversation with the computer, users can choose things they want to see just by the click of the mouse (Australia, 1994).

vii. C.D – ROM (Compact Disk Read Only Memory) looks just like an audio compact disk. These store much information including video and music.

Computers

Computers according to Alden (1998) are tools for learning as they help in developing memory skills, offered after school study or tutoring sessions, allow children to experiment and investigate abstract signs and math concepts through stimulations. Computer is also a creative tool, which provides access to an infinite colour palate and fine-tuned key board which keeps child busy creating art and music. It is a research tool, which offers information that is not available in the school libraries. It is a communication tool used with a soft ware to enable individual to share experiences with other people far away. Computers can also be used as an entertainment tool played alone, with friends or parents. It is also a productivity tool, combined with software programs such as word processing, data bases and spread sheets, can help individuals (especially children) to work efficiently.

Computer is an electronic machine that can store, organize and find information, do calculations and control other machines. People can use computer's to design graphics and full-motion video, compose music send electronics mail, make airline or hotel reservations or search the Library of Congress over the world wide web. Computers are use in all aspects of business and education. New systems assist people with disabilities by providing the Kurzaweil Reading Machine (Computer), which electronically scan printed text and speak aloud for blind or visually impaired people. They also show text on the screen large enough to read and is equipped with touch- sensitive screens or pointers for people whose physical disabilities make them unable to typed (Watt and White, 2000).

Personal computers were commercially introduced in the late 1970s, and home Internet access became widely available to the general public around 1992-93. The growing access to home computing has not been evenly distributed, however, people with less than a high school education have less access to computers than people who have completed high school and much less than people who have completed college (Lievrouw, 2004). The earliest computers were machines built to make repetitive numerical calculation that had previously beer done hands. As time goes on, attempts were made to produce electromechanical calculators. While computers continued to improve, they were used primarily for mathematical and scientific calculation computer technology was finally applied to printed communication in the 1970s when first word processors were created.

Accessories used with the computer are: PDA (Personal Digital Assistance), this refers to a hand held computer that serves as a mobile organizer and allows data

such as e-mail, outlook calendar appointment and contacts to be accessible while away from the desk. Data is synchronized between the PDA and Desk Top Computer via a synch cradle. Another accessory is the USB drive (Universal Service Bus), this refers to a small, portable flesh memory stick that ploughs into any computer's USB port and function as a portable hard drive, this can be carried in pocked and allow data to be easily transferred from one machine to another. It is also known as 'flesh drive', 'pen drive', 'keychain drive'.

The U.S department of labour, Bureau of Labour's Statistic (1999) reports increases in computer ownership in the areas of education, age, race, income and region. As per 1999, data indicates that over 50% of household owned a computer and over 60% of those owners are connected to internet (Raine and Kabut, 2000)

Television

Just as inventors had sought ways to transmit sound using electromagnetic waves, they worked to develop similar methods for transmitting pictures. By the first decade of the 20th century, the basic ideas of television technology were understood, although it took several more decades to work out the necessary improvements in existing technology.

Since 1950s many improvements have been made in television technology, particularly the introduction of coloured television in the 1960s. Image reception has become clearer, and screens have become larger. Most television can now receive stereo sound. The wide spread growth of cable television has introduced many new channels and types of programmes into homes. And today, Direct-Broadcast-Satellite

(DBS) services allow individual households to receive hundreds of channels carried by satellite direct into their homes (Lievrouw, 2004).

Mobile Phone

This is a long-range, electronic device used for mobile telecommunication such as mobile telephonony, text messaging or data transmission over a cellular network of specialized based station known as sites, owned by mobile network operators. A mobile phone is also referred to as wireless phone, cellular phone. In addition to the standard voice function, current mobile phones have additional services and accessories such as, SMS for text messaging, e-mail, packet switching for access to the internet, gaming, Bluetooth, infrared camera with video recorder, mp3 player with radio and GPS, some phones also include a touch screen.

A mobile phone offers wide area service as the user moves from one base station coverage area to another. There are related systems such as:-

- Car phone-this is a type of telephone permanently mounted in a vehicle.
- Cordless phone-this use private base station, it is connected to a conversational land line for calling.
- Satellite phone- this is connected to an artificial satellite, which in turn relays calls to another satellite phone. It covers a greater area. (WHO, 2000)

Lonn et al (2005) asserts that mobile phones are used for variety of reasons including keeping in touch with family members, conducting businesses or used in the event of emergency for example organizations that aid victims of domestic violence offer a secret cell phones to potential victims.

2.3 Influence of Modern Information Technology on the Family

The influence of modern information technology on the family can be recognized by a review of the changes in the roles and contributions of each family member to the family's well-being. Some of the changes are as a result of an infusion of cultures borrowed through the utilization of any of the modern information technology devices around. In trying to assess the significance of the changes in family life brought about by modern in formation technology, we must recognize that these changes are gradual and that there are significant variations between countries, due to cultural/differences and between those who are economically comfortable and those who are economically deprived.

It is for this reason that Sasse (1997) explains the attitude of the Amish people (in the United States) towards modern information technology. For the Amish, the family is the centre of life stated the author; they avoid anything that would break up their families and their communities. The Amish believe that television, computers/internet, radios, and VCRs separate the family. They believe that, the atmosphere is quiet without the interruptions of news, movies and cassette tapes that could disturb them. The phone is avoided for much the same reason. Call would interrupt the flow of work around the farm and family time together. Phones, they believe will also reduce the desire for families to visit each other, as visiting is a social activity among the Amish that helps to establish their sense of community.

MIT devices serve as a companion to a person having problems and need not to speak of them but turns towards the efficient silence- fillers, radio and television. Television, he further explains facilitate material reunion because children no longer

go out in the evening, but members of the family are indeed all present materially, but centred on the television set, they are unaware of one another. It is no longer necessary for the members of a family to have anything at all to do with one another or even to be conscious of the fact that family relations are impossible. The television shots up the individual in a universe in which he is alone no more face-to-face encounter, no more dialogue. Television because of its power of fascination and its capacity of visual and auditory penetration is probably a technical instrument, which is most destructive of personality and human relation Wright and Hughson (1995).

Cooley (1999) in a write up titled 'impact of technology on the family' is of the opinion that, the abundance of information, becoming ever more very common and ubiquitous actually threatens individual privacy. Within the family, this output of technology impacts negatively on domestic relations between family members. The modern information technology devices such as Internet and E-mail, as personal extensions of the individual are highly demanding and time consuming. They also serve as a factor that can mitigate family cohesion. This fact attest to the wide range of specific interest's members of the family can develop with many other individuals outside the family environment who seem to exist only on the screen but are nevertheless influential.

Children get a lot of benefit from being online, but they can also be target of crime and exploitation in this as in any other environment. Information on sport, weather, movie reviews, and encyclopedia can be obtain from the net. It can serve as educational and entertainment tool, users can learn about virtually topic, visit museum

take a college course or play one endless number of computer games with other users or against computer itself (Magid, 1998).

Modern information technology devices, such as television, internet/computer and others portray the emergence of manifold families e.g. cohabitation, deliberate single parent or same gender unit, acknowledged in a few European countries (Sweden and in France for instance) instead of the ideal nuclear family (as practiced by the western count or the extended family (as practiced in the African countries) that remains the model, alongside the preserved values.

A study conducted by Elkin and Handel found that children aged 2–5 years watched an average of nearly three and half hours of television per day, while 6 – 11 years olds watched an average of three hours per day (Elkin and Handel, 1989). According to NetAlert (2003) the Internet offers opportunities for today children. Instance communication, information on discovery and online publishing open up a world of excitement and happiness for children of old ages. Parents also feel the influence of the media as news spread quickly through the Internet when a serious incidence happens to a child. Over the past decades, books have lost ground to television and computer software as a source of information for children.

Television informs, entertains, and teaches us. However some of what TV teaches may not be the things a family especially children should learn. TV programmes and commercials often show violence, alcohol or drug uses which are unsuitable programmes for children and teens. Watching movies on tape and playing video games only adds to time spent in front of the TV screen instead of spending time with the family (Hopp, 1990).

Lievrouw (2004) is of the view that, computers can shape children's social interaction and development. In children's interaction with parents and other adults' one obvious effect has been frequent reversal of the traditional parent-child relationship with the computer taking on the role of teacher to the parents.

Sasse (1997) is of the view that modern information technology has improved communication as it helps in transmitting major events that occur. Families are able to know about the events, as they occur immediately with media coverage. One can be right there by even experiencing it as it happens. This she affirms, are far different from those times when it took months to get a message from a relative. The telephone is often used as a quicker and more personal form of communication than letter writing. People now use the mobile phones to make it possible to converse outdoors and in automobiles.

Figley (1985) cited by Greene (2001) explains that the personal or home computers, afford a family the ability to generate income, do banking, play games, and become educated. He states that, the family has become more autonomous and powerful as a result of computer. He further explains that the number of families with computers have increased.

Like the telephone computers have the power to bring people together. Through networking technology computers across the room or across the world can be connected to allow people to communicate, share taught and information. Children in the United State and Russia, for example have recently established electronic "pen-pal" relationship (web, 2008).

Cell-pone gives a sense of staying connected but a new study finds the devices are actually interfering with family life. A study in the journal of marriage and family finds that cell phone and pagers interferes with family life by bringing job worries and problems in the home. Working couples with children revealed that cell phone use tends to decrease family satisfaction and increase distress. Some parents explain that cell phones enable them to attend their children school activities without missing anything, some feel that they do not give attention to parents or to children while on phone.

Wakefield (1985) opined that modern information technology devices might generate family frictions as they may require time in amounts frequently underestimated. Pope John Paul II (1994), in his message for World Communication Day 1994, has a different view as he stated that, modern information technology devices can enrich family life; they can draw family members together and foster their solidarity with other families and communities. It can increase not only their knowledge, but also their religious knowledge, making possible for them to hear God's words, to strengthen their religious identity and to nurture their moral and spiritual life.

He also explains that modern information technology devices can also harm family life; by propagating degrading values and models of behaviour, by broadcasting pornographic and graphic depiction of nudity, brutal violence and religious skepticism; by distorted, manipulative accounts of news, events and current issues; by carrying exploitive advertisements that appeals to base instincts and by

glorified false vision of life that obstruct the realization of mutual respects of justice and of peace.

Olaitan (2003), Decey and Travers (2003) have the same views with the Pope on the negative influence that modern information technology have on the family, especially children. Children, they said, learn aggressive and practice pro-social behaviour through effective modelling seen on the screen. The negative effects they say have been more obvious. Acts of violence, sex, low moral standard, alcoholism, crime, abortion and drugs have polluted children. Pre-scholars and school age children are influenced in their behaviour and moral standards when they watch television several hours a day. Clark and Colleagues gave example of a child 4-6 year old who said, he preferred television to his father. In a similar case, a boy of 18 years in Cairo slum of Mansheyet Nasar, to show how much love he has for the modern information technology, stated, "the minute I sat down to watch the television, I forget even my mother's name" (Ismail, 2003).

Computer and video games have been very popular among children and teenagers. The strategies used to build the games, the graphics, the quality of sound, the interactivity all make them quite irresistible among the younger generation. The games, according to researchers, have both negative and positive effects on the game player. Game player score better at vision texts as compared to non-game player. Games could improve children's logical thinking ability and problem solving skills. Games, where gamers have to build houses, cities and develop war strategies help them to develop their logical skills and also help in decision making. Educational

games help to improve their communication and problem solving abilities and alertness (Rufus, 2004).

Decey and Travers (2003) added that, the effect of using modern information technology especially television violence are more forceful for children than adults, particularly if children believe that the television violence is real. Children can also become desensitized because of their exposure to a steady diet of television violence. Decey and Travers (2003) believe that changes in children's behaviour follow the viewing of televised violence which come from their response to fast action, loud music and camera tricks.

Many indigenous and non-indigenous writers suggested that modern information technology (television plays a negative impact in the lives of people. They believe it promotes stereotypes of native people, increased rates of alcoholism, gang membership and suicide among native youths; and erosion of native values and languages (Browne, 1996).

Kendall (1994) expanded on the above view when she said, teenagers in the family are particularly at risk as they often use the modern information technology devices unsupervised, and are likely to participate in on-line discussions regarding companionships, relationships, or sexual activity, more than the younger children. She broke the risks into:

i. Exposure to inappropriate material as sexual, hateful, or violence in nature, encouraging activities that are dangerous or illegal.

ii. Physical molestation: In this case, a child may provide information or arrange an encounter that could risk his or her safety or the safety of other family members.

iii. Harassment: the risk is that a child might encounter E-mail or chat/bulletin board messages that are harassing, and demeaning.

iv. There is also the risk of the child doing something that has negative legal or financial consequences on the family.

Young (2004) also has three (3) categories of the influence of modern information technology on the family; viz

i. Time Displacement: This assesses the degree to which the introduction of new information technology in a household affects patterns of time use and allocation. The other impact is how individuals relocate their time once any of the modern information technology devices are brought into the household.

ii. Modern information technology, work, and the home: Modern information technology enables individuals to stay home and work-whether by telecommuting to a parent officer or establishing a home-based business. The relocation of work to the home is believed to offer multiple advantages to individuals and families. On the other hand, the use of modern information technology to work at home can disrupt crucial family dynamics (roles, interpersonal relationships, and the sense of home as sanctuary) and create psychological isolation.

iii. Psychological well-being: The presence of information technology devices in a household can be beneficial. Greater connectedness to a community, ease of communication with family and friends, and improved access to information can enhance self-worth, feelings of satisfaction, a sense of community and kinship, and personal empowerment. However, scholars express equal concern for the dark side of using the modern information technology devices: isolation; and addiction to the device.

Chesley (2005) in a study titled "Distress level raised by ongoing cell phone use" that the ongoing use of the cell phone as compared to computer based use such as email, is linked to increase psychological distress and reduced family satisfaction. For both men and women, cell phones allow job worries to spill over into home life. But only women also experience the opposite effect- the spill over of home concerns into their work life. The cell phone has the influence of bringing both work and family worries for women, which affects their level of distress and family satisfaction. The author interviewed working couples over two time periods, 1998-1999, and 2000-2001. The finding shows that use of cell phones and pagers in that two year time period decreased family satisfaction and increased distress, and negative attitude to work.

2.3.1 Influence of Modern Information Technology on Family Interaction

Family interaction is the interpersonal dynamics of the members of a family in a variety of environments and activities. It can be seen as a sequence of interlocking events occurring over time and consisting of the three basic characteristics of

sequentiality, flexibility and constraint (Lichten, James, Powell, 1985). According to Riley and McClosely (1996) interaction within the family can be influenced by modern information technologies, which are individualistic machines. Modern information technology can take away family interaction time as well. While the Oxford Advanced Learner's Dictionary (2000) defines interaction as a means of communication with somebody, especially while you work, play or spend time with them. Family interaction includes:

- Face-to-face contact
- Telephone calls
- Letters
- E-mails

The primary purpose of family interaction is to preserve and strengthen family relationships whenever possible. Additional purposes of family interaction include:

- Facilitating timely reunification of children to their families.
- Assessing and addressing safety issues during family interaction.
- Assessing and working with the family to enhance parental protective capacities.
- Minimizing placement induced trauma for the child/family caused by separation.
- Establishing, enhancing, and maintaining child, sibling and family attachments.
- Establishing and facilitating other permanency options, when appropriate (web).

Family interaction is an opportunity to maintain, establish, and promote parent-child relationships. It is an opportunity for parents to evaluate their own parenting capacities and gain knowledge of new practices and views about parenting. Children, their parents, and their siblings have a right to family interaction whenever possible in order to maintain and enhance their attachment to each other. Modern information technology has the ability to influence and encourage family interaction. As according to Magid (1998) millions of people are now going online to exchange electronic mail, surf the world and participate in chat groups and many other online actives.

English-Lueck (1998) in a seminar paper stated that modern information technology devices facilitate the interactions between families, as they watch television, camp, travel, eat and talk together. The devices that facilitate that action or talk are phones, networked computers, pagers and answering machines. Parents page their children to let them know that, they are concerned about them, which demonstrates parental responsibility. Mothers, who create barriers of physical distance in order to work, travel several hours a day to be able to maintain an affordable, distinct home life as they use cell phone to begin and end their management day during the commute.

He further explains that families use the modern information technology devices to coordinate activities ranging from after school baseball to weddings. They create networks of connectedness by making and sending videotapes and e-mailing distant relatives. Family histories are recorded and distributed among family members, while cell phones create a sense of street safety.

Rainie and Kobut (2000) have similar views with English-Lueck (1998) as they examine the influence of one of the modern information technology devices (internet) on the family. The researchers reported that 55 percent of Internet users said, e-mail exchanges have improved that connections of family members. The report also showed that 26 million Americans (as of the year 2000) were communicating via e-mail with a family member, with whom they had little previous contact; 24 million have used the web to locate family and friends with whom they had also lost contact; 16 million said they have learned more about their families since being online; and 30 million have at least one family member with a website.

2.3.2 Influence of Modern Information Technology on Family's Time Spent Together

Having time together as a family is a thing desired by every member of a family, so also is having time to pay attention to any member of a family and what he or she is doing. Although all are necessary, but these are factors militating against any member of a family paying or giving attention or time to the others. Such factors include the acquisition of modern information technology devices in a household.

Olson and Defrain (2000) gave an example of a research carried out. In that research, the researcher wanted to find out, what makes a happy family. The most frequent responses, were "a family sharing time together". They further expatiated by saying that, when families share time together there is happiness, which often centers on activities that are shared as a family. There is also pleasure, which centers on simple activities which do not cost a lot of money.

According to Ridge (2002), technology has created new ways for families to spend time together. Most parents today want to spend more time with their kids, they enjoy the time spent with children when using electronic media. Parents are of the view that technology brings families closer together, by enhancing traditionally passive or individual activities such as watching television or webs surfing and introducing new applications to use products collaboratively.

Strong families identified these popular family activities: meals together, house and outdoor recreation including camping, playing catch and other yard games, canoeing, hiking and picnicking.

In their findings, Sporakowski and Colleagues (2001) discovered that households with more than one information technology device especially (computer) have a much higher rate of over all modern information technology use for both children and adults. The family spends more time using these devices and also use them in a more significant way than the family with a single device. Family argument over the time use on any of the information technology device, feelings of the family spending too much time on the device, and the need to regulate how much time spent on the device were all ignorantly high in families that have multiple devices. Their findings shows that actual time spent on the modern information technology devices within the families with one or more are not significantly different, therefore the finding shows that multiple devices in the households will not increase the amount of time spent together, but can increase some of the negative impact on the family social life.

According to Olson and Defrain (2000), researchers at Carnegie Mellon University, discovered that individuals who spend even a few hours a week on-line experience higher levels of depression and loneliness than those who spend less or no time on one of the modern information device. They also found that individuals, who use the Internet more, tend to decrease their communication with other members of the family and reduce the size of their social circle.

The use of modern information technology as related to family interaction is based on the stages of family, stated Watt and White (2000). They explained by saying that computer can add a dimension to the individualization of early marriage and complicate a couple quest for joint time together. This they based on the fact that computer connected to Internet are tools that are used by individuals and can utilize a lot of individual's time, thereby hindering him/her from having time to interact with the family. The addition of computer or any of the information technology devices in the family home increases time spent alone by 23 percent, and it tends to take time away from sleeping and family interaction. In a contrary view Katz and Aspden (1997) stated that the vest majority of internet users reported no change in the amount of time spent with family members and friends on the phone or through face-to-face contact. Kraut et al (1998) have contrary view with Watt and White (2000) when they explain that internet is associated with loneliness and depression as its bring about increased social disconnectedness.

Pope John Paul II (1994) stated that modern information technology especially the television, can isolate family members in their private worlds, cutting them off from authentic interpersonal relations. It can also divide the family by alienating

parents from children and children from parents. This is supported by Hildebrand (1997) who viewed that modern information technology devices can reduce communication within families as everybody watches separate programmes where there are multiple sets. Children having computers in their bedrooms use them in solitude, as they play computer games. This robs them of time for other social activities. One recent survey according to him found that more than 60% of children in junior and senior high schools spent all their computer time alone. Watt and White (2000) also observed that adolescents who tend to socially isolate themselves are at risk of becoming absorbed into the "safe" world of cyber-space where they can finally interact socially without the inhibitors of interacting personally face-to- face. Mitchell (1985) pointed out that families with new home computer sets play games and interact together.

On the other hand as games prove to have positive effect, they also have negative effect specialists have confirmed that children who spend too much time playing electronic games are easily susceptible to bad posture and causes a disequilibrium in their daily routines spending many hours in front of the monitor and not going out enough could also cause social problems thus resulting in becoming shy and introvert. Games developed nowadays happens to be a lot more violent which makes the games have a tendency to lose control and become more aggressive (Rufus, 2004).

Anderson (2004) classified the benefits and dangers of video and computer game playing as follows:-

Positive Effects

- Introduces children to computer technology
- Gives practice in following directions
- Provide practice in problem solving and logic
- Provide occasion for parent and child to play together
- Games are entertaining and fun
- Some games have therapeutic application with patients.

Negative Effects

- Could foster social isolation
- Practicing violent acts may contribute to aggressive behaviour
- Games can confuse reality and fantasy.
- Game environments are often based on plots or violent and aggression.
- Many games only offer an arena of weapons, killings, kicking, stabbing and shooting.
- Academic achievement may be negatively related to overall time spent playing games.

2.3.3 Influence of Modern Information Technology on Family Communication

Communication according to Kelly – plate and Eubanks (1994) is the exchange of information – facts, opinion and feelings. Exchanging information, according to them, means sending and receiving messages. It is the process of sending or creating messages, receiving and evaluating messages from others. Communication is usually a

mixture of verbal and nonverbal messages: How well one sends and receives messages will influence interaction between two or more people. Messages communicate information through feelings Lievrouw (2004) opined that communication is a vital part of personal life and it is also important in business, education and any other situation where people encounter each other. Communication among family members according to Lievrouw is the most important relationship skill needed to communicate or exchange information, coordinate schedule and make life runs smoothly.

Sasse (1997) and Lievrouw (2003) are of the view that communication is basic to good relationship. How well one send and receive messages will influence interaction among family members. It is the energy that sparks caring, giving and sharing ideas and information with others in a particular time and place. Communication includes writing and talking as well as nonverbal communication (such as facial expression, body language or gesture). Visual communication (the use of images or pictures such as panting, photographic, videos or films) and electronic communication (telephone calls, electronic mail, cable television or satellite broadcast).

Therefore, communication is the most important relationship skill needed within the family, the family needs to communicate in order to exchange information and make life run smoothly. Good communication is when family members feel free to express themselves while others feel comfortable to listing. Sasse (1997) opined that communication faster understanding among family and that it is vital in keeping track of what family members are doing in building relationship.

Communication between individuals can be fostered by modern information technology, but human interaction could be lost. Communication via the computer, internet, cell-phone is different from face - to- face communication. Modern information technology can draw individuals away from human contact as they communicate through machines. It can also keep families in contact when separated by long distances (Greene, 2001). Another view by Kraut and his colleagues (1998), is that modern information technology (Internet) has brought about decrease in communication between family members and slight increase in feeling of depression as the use of the Internet increased in the family home. English-Lueck has similar view as he discovered that modern information technology devices could lead to dilemma, when one member of the family fails to reach the other through the cell-phone. Infidelity was also discovered (through the use of modern information technology), which led to the sudden restructuring of a family.

Kraut et al (1998) also reported in their study that 10-19 years olds indicated that they use the modern information technology for social purposes, compared with adults the teens especially girls, use it to communicate with friends, meeting new people, getting personal help and forming groups.

2.3.4 Influence of Modern Information Technology on Parents Attitude towards Socialization of children

Socialization is the parental care given to children towards training them in accordance to the rule and regulation of the society, to enable them live with these in their community Minnet (2000).

Bellingham (2007) views socialization as the means by which human infants begin to acquire skills necessary to perform as a functioning members of their society, and is the most influential learning processes one can experience. Ely Chinoy, in a standard textbook on sociology, quoted by Bellingham, says that socialization serves two major functions: One, it prepares the individual for the roles he is to play, providing him for repertoire of habits, beliefs, and values, the appropriate pattern of emotional reporises and the modes of perception, the requisites skills and knowledge. On the other hand, by communicating the contents of culture from one generation to other, it provides for its continuity and persistence.

Types of Socialization

- Primary socialization: This occurs when a child learns the attitudes, values and actions appropriate to individuals as members of a particular culture.
- Secondary socialization: This refers to the process of learning what is appropriate behaviour as a member of a small group with a larger society e.g. entering a new profession.
- Departmental socialization: It is a process of learning behaviour in a social institution or developing your social skills.
- Anticipatory socialization: The process of socialization in which a person rehearses for future positions and social relationships.
- Re-socialization is the process of discarding former behaviour patterns and reflexes, and accepting new ones as part of transition in one's life. This occurs throughout the human life cycles. This is sharp break with the past, and needing to learn different norms and values (Pinker, 2002).

Modern Information Technology devices in one way or the other has affected children, inspite of parental efforts towards their socialization. For instance, according to Pope John Paul II (1994) Modern Information Technology devices propagates degrading values and models of behaviour, by broadcasting pornographic and graphic depiction of nudity, brutal violence and religious scepticism and by glorifying false vision of life that obstruct the realisation of mutual respect of justice and of peace Olaitan (2003), have similar view, as opine that children learn aggressive and practice pro-social behaviour through effective modelling seen on the television Acts violence sex low moral standard alcoholism, crime, abortion and drugs have polluted children pre-scholars and school age children, he further stated are influenced in their behaviour and moral standards when they watch television.

Parents' attitudes towards socialization of their children have been influenced by the use of Modern Information Technology devices, as they encourage parents to develop the habit of communicating with their children through the cell-phone as it helps transmit major events that occur (Sasse, 1997).

According to Magid (1998), parents due to the negative effects of Modern Information Technology devices, now warn their children towards exposing some vital information while on the net as they can be target of crime and exploitation.

Wakefield (1985) opined that some parents did not give attention to their children while on phone or any of the devices, this has decreased family satisfaction and increase distress, especially on children-parents, instead of spending quality time with their children in their early stage of life, have made these modern information technology devices their children baby sitter (Ridge, 2002).

Navert (2008) stated that watching plenty of television combined with low self-esteem, poor relationships with parents are some of the factors that may lead to young people having sex before the age of fifteen (15). In other words, this is due to the amount of time spent watching television.

2.4 Empirical Studies Related to Modern Information Technology and Family Interaction

Research has been conducted by many researchers on the issue of modern information technology as it relates to family life. Most studies were on the influence of MIT devices such as internet, television, computer and many others. All these studies were focused on children and their parents. The studies reveal the influence of this modern information technology to be both negative and positive.

Turwo and Nir (2000) in their study on information technology (internet and the family in America) carried out a study to find out the view of children and parents on the internet. The aim was to find out what parents generally think and do about the web. Research design used was the survey method. Data collected was through telephone interview with parents of children. A sample of parents with at least one child between ages 8-17years and 304 youngsters were used for this study. All respondents belonged to households with at least one computer connected to the web. The random digital dialling (RDD) sampling technique was used to locate respondents. A child or another instead was interviewed in the same household. The other half of the children sampled (which parents were not interviewed) was located using the RDD sampling methodology.

The above study based its findings on parents and children, this shows how adequate and unbiased the researchers is, as the researcher give room for opinion from both. This gives strength to the result of the findings. This implies that parents and children make used of the internet but children use it the more. This study is similar to the current study as both parents and children were used for the study but it differs in the sense that the research was based on only one MIT device and instrument used was the telephone while the present study made use of questionnaire.

Young (2004) carried out similar study research to investigate the impact of information technology on youths and their families in Hong Kong. He took the family as the unit of analysis. The purpose of the study was to find out how information technology may affect family relationship (parents and youths perspectives). Research design for the study was survey method. Instrument for the study were three sets of questionnaire designed and administered to parents and their children. Data were collected from 1218 parents and their children aged between ages 9 and 24. The youth sample included 1384 students from primary to tertiary level and 329 working youths. In his finding of the study, it was revealed that information on technology has impact on both children and parents as he revealed that authoritative parenting was found to be related positively with the general psychological well-being, as well as lower levels of lowliness, parental concern and responsiveness are exhibited as parents encourage positive use of information technology and discourage the negative use. Parental knowledge about the youths' activities and friends on the internet were generally low, this aspect of parenting behaviour was found to be a factor correlated with better information technology-related attitude of youths and

more discrete usage behaviour it related parental demandingness in terms of controlling youths' access time is very low, this shows passiveness on the side of the parents. Parenting behaviour is found to be positively correlated with the better attitude of the youths towards information technology.

This study is similar to the present study but Young did not indicate the target population of the area of study, procedure for data collection and analysis were not specified.

Kraut et al (1998) carried out a study on the social impact of home computing in the Pittsburgh. The sample for the study consisted of 150 people from 48 house holds. The design for study was survey method and data was collected through observation and interview. The purpose of the study was to predict the impact of home computers and internet, and examine how early adaptors were using them. The researcher interviewed older people and those that are knowledgeable in the history of Pittsburgh, he also by careful examination, observed the behaviour of some early users.

The result obtained from the study were that early users used the computers and internets to support business functions, while families used them as means of communication with an at-home wife to plan for social visits and in home stopping. But later, the computers and internets were used in addition to the early usage for entertainment.

Kraut et al (1998) study on the social impact of home computing focused only on the computer, which is in contrast with the present study that focused on various modern information technologies. The study indicate the sample but did not indicate

the target population, it also did not indicate the number of persons per household as the case is in this study.

Greene (2001) undertook a research on the computers and the family, in Virginia USA. His stated aim for the research was to find out the effects of computers on the families. The work investigated families with computers, how they are used and how their usage affects family relationships. His sample for the study were a list of 103 families out of which 88 individual families participants were obtained representing 20 families. The average family size was 4. Instruments for data collection were sets of questionnaire, one for adult and the other for children. Both utilized a Likert-type response scale. The researcher's findings were that adults used their computers on a fairly consistent basis, but have little time for family interaction. Adults and children use the computer for different purposes and that computers tend to isolate individuals especially households with more than one computer. Household with more than one computer have increase rate of negative impact on the family.

In Greene's study, the instrument used which was a questionnaire was very lengthy with a lot of questions, framed in different forms. This type questionnaire may take a long time for the respondents to respond too.

Harris interactive for Sony electronics (2002) conducted a survey on technology and family quality time. The aim of the study was to find out how technology has created a new way for families to spend time together. The research design used was survey. Data collected was online. A sample of 700 parents and 700 children ages 8 to 17. A total of 1,500 respondents completed the survey. The findings revealed that technology has the potentials of bringing families closer together as they

watch television webs surfing. The survey also found that children even typically reluctant teen-agers, are enthusiastic about engaging in activities with their parents that involve electronic devices. The survey also revealed that technology is a common point of interest for the entire family.

This study is similar to the current study i.e. "modern information technology and family interaction" because its considers ways family spent together but, instrument used for data collection are not the same as theirs was on line. The design used was appropriate.

George (2008), undertook a poll study, "Internet, cell phones, may strengthen family ties in America". The sample population for the study was 2,252 people consisting of Adults who were married with children. The researcher tried to examine trends in single-parents, but the number was very small in the study, sixty (60) percent of Adults said that the new technologies did not affect the closeness of their family, while twenty five (25) percent said cell phone communication made their families closer and 11 percent said that the technology has a negative effect.

The study further tried to find out whether cell phone and internet had improved the quality of family communication, 47 percent adult are of the view that it had, while 47 percent said that their was no effect, and 2 percent said there had been a decrease in quality.

In this study the researcher focused his study on single parents and adult married with two children. These groups of people as observed by the present researcher can be few in number. The researcher did not indicate the procedure used in

analyzing his data. How he arrived at his findings was not indicated. This study lacks very vital areas in his methodology.

Siemens Conducted a research "cell phones increasingly play an important role in social life" the study was carried out to determine:

How cell phones influence the way people interact with another. Seven countries, namely, Indonesia, Singapore, Thailand India, Vietnam and Philippines were used. Samples of 3000 users were chosen and were divided into three groups: youths (males and females age 15-24) couples (18-54) and office worker (18-54). The survey analyzes the impact of cell phones on people's life.

The findings revealed that the mobile phones are an important facilitator as a tool to manage and foster relationships. Eighty percent of the respondents are of the view that communication is faster more conveniently and relatively les expensive via the cell. Eighty nine percent of the Filipino youths, use their cell phones not only to keep in touch, but exchange jokes, 17 percent use the phone to cheat during exams.

As for couples, most respondents in the surveyed countries they use the mobile phones to move their relationship to the next level. Survey of office workers shows that 52 percent of men and 35 percent of women use mobile phone for business purposes only. (D' Bayan, 2007). Siemens which is an organization carried out this research and in their study, procedure used for data collection were not indicated. Being a study conducted by a company, the sample population used for the study was too small compared to the target population which consist of seven countries.

These researches all focused on the utilization and influences of modern information technology on families and communities. These studies only made used of

one modern information technology device and not four as in the case of this present study.

2.5 Summary of Related Review Literature

The researcher reviewed related literature on the views or perception of people on the influence of modern information technology device on the families. From the related reviews, the researcher observed that these devices have both positive and negative roles on family interaction. It is clear that some of these devices can enable family members to co-exist as they interact positively together, while some do not. The review of related literature also looks at some of the influence of these devices and communication among family members, and family time together.

The chapter started by reviewing literatures under the following sub-headings:

- Concept of family
- Concept of modern information technology and its components
- Influence of MIT on the family
- Influence of MIT on family interaction
- Influence of MIT on family time spent together
- Influence of MIT on family communication

Finally, an empirical study related to the study was carried out. The study put together showed the significance and need for the present study as the related literature where researches carried out in developed countries.

CHAPTER THREE

METHODOLOGY

This chapter deals with the procedure used in this study. It includes: -

3.1 Research Design

3.2 Population for the Study

3.3 Sampling and Sampling Technique

3.4 Instrument for Data Collection

3.5 Validity of the Instrument

3.5.1 Pilot Study

3.6 Reliability of the Instrument

3.7 Procedure for Data Collection

3.8 Procedure for Data Analysis

3.1 Research Design

The study was survey design. A survey design is descriptive in nature. According to Ary (2002), a survey design is used to obtained information concerning the current position of a phenomena. The design was therefore considered suitable since the study will seek for information from a sample that was drawn from a population using questionnaire.

3.2 Population for the Study

The total population for this study comprised all academic and non academic staff of eleven tertiary institutions in Adamawa State. These are literates, married and

with children. Tertiary Institutions were chosen to draw the population for this study, due to their enlightenment about MIT devices. The total population for study was five thousand and forty nine (5,049) from eleven tertiary institutions. As shown in Table 3.1.

Table 3.1: Tertiary institutions with population and households in Adamawa State

Institutions	Population
Adamawa State University, Mubi	482
ABTI American University, Yola	508
Adamawa State Polytechnic, Yola	363
College of Education, Hong	288
College for Legal Studies, Yola	109
College of Agriculture, Ganye	169
Federal College of Education, Yola	238
Federal Polytechnic, Mubi	1,260
College of Health Technology, Mubi	98
School of Nursing, Yola	134
Federal University of Technology, Yola	1,400
Total	**5,049**

3.3 Sampling Size and Sampling Technique

Seven tertiary institutions in Adamawa State were selected, from which the sample for this study was drawn. Purposive sampling was the technique used for the selection. Purposive sampling according to Ofo (2005) is a method of sampling that allows the researcher to hand picks the samples because they are typical to the study and the researcher's needs.

The sample population for the study was five hundred (500) respondents. From the following tertiary institutions, the sample size is based on Nwana (1981) who suggested a sample of ten percent (10%) population for a few thousands.

Finally, households having parents and children from each institution were also purposively selected, giving the researcher a total of five hundred (500) respondents. Table 3.2 showed the selected sample of tertiary institutions in Adamawa State.

Table 3.2: Sampling of tertiary institutions and Households with Modern Information Technology Devices in Adamawa State

Institutions	No of Household	Sample Size
ABTI American University, Yola	20	80
Adamawa State University, Mubi	20	80
College of Education, Hong	12	48
Federal University of Technology, Yola	20	80
Federal College of Education, Yola	15	60
Federal Polytechnic, Mubi	30	120
College of Agriculture, Ganye	08	32
Total	125	500

3.4 Instrument for Data Collection

The instruments used for this research were a set of five hundred questionnaires titled: "Influence of Modern Information Technology devices usage on family interaction in Adamawa State". The questionnaire was developed based on extensive literature review, research questions and objective of the study. The instrument consisted of two parts. Part one contained items designed to obtain personal information from the respondents. Part two contain items designed to find out availability, types and usage of MIT devices in a household. Part two was further broken into four sections (A,B,C and D). Contain items designed to find out the perception of families on the influence of modern information technology devices and family interaction. Section 'B' dwelt on the influence of MIT devices on the time family members spend together. Section 'C' was designed to find out the influence of

MIT devices on family communication. Section 'D' was designed to find out attitude towards child socialization in Adamawa State.

Some items on the questionnaire utilized 4 points Likert type scale as according to Ary (2002), its assesses attitudes towards a topic presenting a set of statements to which respondents whether they strongly agree, agree, disagree, strongly disagree. All the responses assigned numerical values ranging from 1-4. Thus:

Strongly agree (SA) – 4

Agree (A) – 3

Disagree (D) -2

Strongly disagree (SD) -1

3.5 Validity of Research Instrument

After constructing the questionnaire, it was subjected to face validation by the thesis supervisors and a statistical analyst who made their own inputs by checking items with the objectives and hypotheses of the study. This is in order to ensure that the measuring instrument will measure thoroughly and accurately what it intends to measure. In other words, validation is to ascertain the appropriateness of questionnaire items.

3.5.1 Pilot Study

The objective of the pilot study was to determine the reliability coefficient of the designed questionnaire, assess the ease with which the respondents will respond to the questions and to evaluate its ability to fulfil the objectives of the study. A total of

forty (40) respondents made up of adults and children within the university premises of Ahmadu Bello University, Zaria were involved in responding to the instrument. This were filled under the supervision of the researcher, after which they were collected and subjected to statistical analysis in order to the determine the reliability coefficient of the instrument as well as appropriateness of questionnaire items. Despite all these, some questions were not consistent with the items in the instrument, they were therefore reconstructed and others were removed in order to have appropriate responses as perceived by the respondents.

3.6 Reliability of the Instrument

The data collected from the pilot study were statistically tested to find out the reliability of the instrument using Cronbach Alpha Coefficient. The result of the test gave reliability coefficient of 0.499 and 0.636 for the internal consistency coefficient for the instrument. Therefore, this coefficient indicates that the instrument was reliable.

3.7 Procedure for Data Collection

Five hundred (500) copies of the constructed questionnaire were distributed by hands, through the help of seven research assistants. One research assistant was employed in each tertiary institution used for this research. Each research assistant was instructed on how to administer and collect all the questionnaire. Due to the nature and focus of the research questions, only family members who were intellectually able to complete the questionnaire were involved. Four copies of the questionnaire were send

to each house through the head of each household to be filled by two children from ages 12 – 21 and the parents. The last section (D) was responded to, by parents only as this was to investigate the influence of MIT devices on parents attitudes towards the socialization of their children. The respondents were given a week to complete and return the questionnaire. Instrument can be found in the appendix.

3.8 Procedure for Data Analysis

The data were collected by research assistant in the various tertiary institutions and they were statistically analysed with the use of Statistical Package for the Social Science (SPSS) 13th Edition. Frequencies and percentage were used for the bio-data variables while frequencies, percentages, means and standard deviations were used to answer the research questions.

Pearson Product Movement Correlation (PPMC) Statistics was used to test the four null hypotheses at 0.01 (.000) level of tolerance. This was used to determine the relationship between the use of modern information technology devices on family interactions and time spent together, family communication and parent-child socialization.

CHAPTER FOUR

DATA ANALYSIS: PRESENTATION AND ANALYSIS OF RESULTS

This research work titled "Influence of modern information technology devices on family interaction in Adamawa State" comprises 500 selected respondents categorized into three distinct groups according to the size of their family. Their responses form the basis of this analysis. Research questions as well as result hypothesis were answered and tested respectively. Discussions of findings including summary of major findings are all contained in this chapter.

4.1 Analysis of Demographic Data

Table 4.1: Distribution of Respondents by Composition of the family

position in the family	Frequency	Percentage (%)
Fathers	125	25.0
Mothers	125	25.0
Children	250	50.0
Total	**500**	**100**

Majority of the respondents numbering 250 representing 50% are children, while 125 representing 25.0% are mothers and the remaining 125 representing 25.0% are fathers.

Table 4.2: Distribution of Respondents by Family Size

Number of Family Members	Frequency	Percentage (%)
1 – 4	102	20.4
5 – 8	210	42.0
9 and above	188	37.6
Total	**500**	**100**

Table 4.2 revealed the respondents distribution based on their family size. According to the Table 102 of the respondents, representing 20.4% are from 1– 4 family members group, while 210 others representing 42.0% are from 5 – 8 family members group. The rest 188 of then representing 37.6% are from 9 and above family members groups.

4.2 Answers to Research Questions

Research Question 1a:

What are types of modern information technology used in Adamawa State?

Table 4.3: Distribution of Respondents by Types of Modern Information Technology usage in Adamawa State

S/No	Level of response on Types of modern information technology used	Category of responses			
		Agreed		Disagreed	
		F	%	F	%
1	Cell phone	451	90.2	49	9.8
2	Television	450	90.1	50	10.0
3	Personal computers	293	58.6	207	41.4
4	Internet	83	16.6	417	83.4
5	All of the above	45	9.0	455	91.0

According to Table 4.3 the types of modern information technology devices used in households showed that 451 of the respondents representing 90.2% used cell phone; while 450 of them representing 90.0% use television. The third most used type of modern information technology according to 293 of the respondents representing 58.6% is the personal computer, while 83 of the respondents representing 16.6% use Internet as the fourth most used modern information technology types, while only 45 of the respondents representing 9.0% make use of all the above modern information technology devices.

Research Question 1b

What are the reasons for MIT usage by families in Adamawa State?

Table 4.4: Identification of Respondents by Reasons for Modern Information Technology usage in Adamawa State

S/No	Level of response on reasons of modern information technology use	Category of responses			
		Agreed		Disagreed	
		F	%	F	%
1	Educational purpose	345	69.0	155	31.0
2	Communicate with family members	320	64.0	180	36.0
3	Entertainment	243	48.6	257	51.4
4	Games	198	39.6	302	60.4
5	Chat with friends	167	33.4	333	66.6
6	News report	114	22.8	386	77.2
	Total	**1395**	**159.3**	**2103**	**306.3**

Details of the above table revealed the reasons for modern information technology use by respondents. Majority of them numbering 345 representing 69.0% said they use modern information technology for educational purpose while 155 others representing 31.0% did not use it for educational purpose. The second main purpose of modern information technology use is communication with family members as 320 representing 64% use it for communication with family members while 180 (36.0%) did not.

Also 243 representing 48.6 use modern information technology to play games while 198 representing 39.6 use modern information technology to chat with friends 167 of then representing 33.4% use modern information technology for to play games 114 of the respondents use modern information technology for the purpose of news

report. Only 20 of then representing 4% said they use modern information technology for all aforementioned purposes.

Question 2a: How much time do family members spend outside and inside the home using MIT devices?

Table 4.5: Distribution of Respondents by Frequency of modern information technology usage in Adamawa State

Frequency of MIT use	Frequency	Percentage (%)
Very frequently	160	32.0
Frequently	71	14.2
Often	46	9.2
Rarely	71	14.2
Total	**500**	**100**

According to Table 4.5 160 of the respondents representing 32.0% use modern information technology very frequently, while 71 others use modern information technology frequently, the same member of 71 representing 14.2% said they rarely use modern information technology, while 46 others representing 9.2% often use modern information technology. The rest 152 of then representing 30.4% did not respond to the frequency of their usage of modern information technology device.

Research Question 2b: What influence does MIT devices usage have on families time together?

Table 4.6: Influence of Modern Information Technology devices on the time family members spend together

S/No	Items	Response categories				Mean	SD
		SA	A	D	SD		
1	The use of MIT devices e.g. personal computers interfaces with time family member spend together	190 (38.0%)	234 (46.8%)	48 (9.6%)	28 (5.6%)	3.1740	.82285
2	The use of MIT devices enhances family ties as they spend time and watch together	202 (40.4%)	159 (31.8%)	57 (11.4%)	82 (16.4%)	2.9620	1.08393
3	Prolong use of MIT devices deprive family members of the opportunities to interact	213 (43.5%)	91 (18.2%)	114 (22.8%)	82 (16.4%)	2.8700	1.22008
4	Other family members prefer to spend most time surfing the Internet than being at home with other family members	173 (34.6%)	108 (21.6%)	79 (15.8%)	140 (28.0%)	2.6280	1.22008

Details show that the use of modern information technology e.g. personal computers interferes with the time family members spend together as this opinion had the highest mean response of 3.1 and details showed that 190 (38.0%) strongly agreed, 234 (46.8%) agreed, 48 (9.6%) disagreed and 28 (5.6%) strongly disagreed on this. Also the use of modern information technology devices enhances family this as they spend time together watching television and computer screen as this had the second

highest mean response of 209620 and details of response showed that 202 (40.4%) strongly agreed, 159 (31.8%) agreed, 57 (11.4%) and 82 (16.4%) strongly disagreed on this item.

Research Question 3: What is the influence of modern information technology devices on family interaction in Adamawa State?

Table 4.7: Respondents Opinion on MIT devices on Family interaction

S/No	Items on use of MIT devices on family interaction	Response categories				Mean	SD
		SA	A	D	SD		
1	MIT devices provides adequate opportunities for interaction among family members	193 (38.6%)	231 (46.2%)	48 (9.6%)	28 (5.6%)	3.1	.8252
2	Using multiple MIT devices reduces face-to-face interaction among family members	201 (40.2%)	159 (31.8%)	58 (11.6%)	82 (16.4%)	3.0	1.08378
3	MIT devices improve family relationship as they promote parent-child interaction	217 (43.4%)	88 (17.6%)	113 (22.6%)	82 (16.4%)	2.9	1.14202
4	Receiving and making calls interrupt flow of work and family time (use of cell or mobile phones)	112 (22.4%)	233 (46.6%)	66 (13.2%)	89 (17.8%)	2.7	1.0015
5	Use of MIT have negative effects on husband and wife interaction. Spouses tend to interact more with devices than with each other	175 (35.0%)	107 (21.4%)	78 (15.6%)	140 (28.0%)	2.6	1.22272

Responses on Table 4.7 gave the level of responses on use of modern information technology devices on family interaction. The highest mean response of 3.1800 is that a modern information technology device provides adequate opportunities for interaction among family members. Details of response on this showed that 193 (38.6%) strongly agreed, 231 (40.2%) agreed, 48 (9.6%) disagreed and 28 (5.6%) strongly disagreed with this opinion.

The second highest mean response of 20.9 on the level of use of modern information technology devices on family interaction is that using multiple modern information technology devices reduces face-to-face interaction among family members as 21 (40.2%) strongly agreed, 159 (31.8%) agreed, 58 (11.6%) disagreed and 82 (16.4%) strongly disagreed with this opinion.

The third highest mean response of 2.8 is that MIT devices improve family relationship as they promote parent-child interaction. Details of response on this showed that 217 (43.4%) strongly agreed, 88 (17.02%) agreed, 113 (22.6%) disagreed and 82 (16.4%) strongly disagreed on this opinion.

Research Question 4: What is the influence of modern information technology devices on family communication?

Table 4.8: Level of opinion distribution on the use of Modern Information Technology devices and family communication

S/No	Items of MIT devices use and family communication	Response categories				Mean	SD
		SA	A	D	SA		
1	MIT devices promotes effective commutation among family members	348 (69.6%)	104 (20.8%)	16 (3.2%)	32 (6.4%)	3.5360	.83552
2	MIT devices promote open communication between parents and children	299 (59.8%)	89 (17.2%)	33 (6.6%)	79 (15.8%)	3.2160	1.1186
3	MIT devices have hindered frequent face-to-face interactions	183 (36.6%)	261 (52.2%)	28 (5.6%)	28 (5.6%)	3.1980	.77975
4	Communication family members is faster and more frequent with the use of MIT devices e.g. phone and Internet	254 (50.8%)	107 (21.4%)	76 (15.2%)	63 (12.6%)	3.1040	1.07494
5	Using MIT devices lesson face-to-face communication among family members	175 (22.5%)	107 (46.2%)	78 (13.2%)	89 (17.2%)	2.7400	1.00520

Details show that majority of the respondents with mean response of 3.5360 believe modern information technology devices promotes effective communication among family members as details showed that 348 (69.6%) 104 (20.5), 16 (3.2%) and 32 (6.4%) strongly agreed, disagreed and strongly disagreed respectively with this opinion. Also, 299 (59.8%) 89 (17.2%), 33 (6.6%) and 79 (15.8%) strongly agreed, agree, disagree and strongly disagreed respectively that modern information technology devices promotes open communication between parent and children. This opinion had the second highest mean response of 3.2160.

Research Question 5: **To what extent do modern information technology devices influence socialization of children in Adamawa State?**

Table 4.9: Influence of MIT devices on Parents' Action towards child socialization

S/No	Items on use of MIT devices and parents' attitude towards child socialization	Response categories				Mean	S.D
		SA	A	D	SD		
1	Parents need to teach their children that not all information on/from MIT devices are reliable	173 (60.0%)	53 (28.0%)	8 (3.2%)	16 (6.4%)	3.5320	.83569
2	Parents need to discuss information on cabled, television and Internet to suit moral upbringing of their children.	149 (56.0%)	45 (22.0%)	16 (6.4%)	40 (16.0%)	3.2120	1.1214
3	Use of MIT devices enables children to share ideas with parents	93 (37.0%)	127 (51.0%)	15 (6.0%)	15 (6.0%)	2.2000	.79075
4	Parents need to monitor the types of programme their children watch and where they go while on-line	127 (50.8%)	53 (21.2%)	38 (15.2%)	32 (12.8%)	3.1020	1.07606
5	Parents need to set limit for their children as they use each MIT devices	39 (15.6%)	139 (55.6%)	24 (9.6%)	48 (19.2%)	2.6760	.95753
6	Use of MIT devices has positively affected the way parents train their children on religious matters	39 (15.6%)	138 (55.2%)	24 (9.6%)	49 (19.6%)	2.660	.96348

According to Table 4.9 above, the highest mean response of 3.5320 on the opinion on use of modern information technology devices and parents' attitude towards child socialization is that parents need to teach their children that no all information on/from modern information technology devices are reliable as details to this opinion showed that 173 (60.0%) strongly agreed, 53 (28.0%) agreed, 16 (3.2%) disagreed and 32 (6.4%) strongly disagreed on this opinion.

The second highest mean response of 3.2120 is that parents need to discuss information on cable television and interest to suit the moral upbringing of their children. Details of respondents to this opinion showed that 298 (59.6%) strongly agreed, 90 (18.2%) agreed, 32 (6.4%) disagreed and 80 (16.0%) strongly disagreed on this item.

4.3 Test of Hypotheses

Hypothesis One: **This null hypothesis states that there is no significant relationship between the use of Modern Information Technology devices and family interactions**

Table 4.10: Pearson Product Moment Correlation (PPMC) Statistics on the relationship between the use of Modern Information Technology devices and family interactions

Variables	N	Mean	S.D	Corr. Index r	Critical r	df	Sig 2-tailed
Use of modern information technology devices (MIT) on family interaction	500	60.2040	8.36123	.864 **	.195	498	.000
	500	14.3880	3.27581				

** Correlation is significant at the 0.01 level (2-tailed)

Table 4.10 is a Pearson Product Moment Correlation (PPMC) statistics to determine if significant relationship exists between the use of modern information technology devices and family interactions as perceived by family members. Results of the PPMC statistics showed that the correlation index r .864 is greater than .195 critical r, while the calculated significance 2-tailed of 0.000 is lower than the 0.01 level of tolerance, confirming that the use of modern information technology devices has significant effect or relationship with family interactions. Therefore, the null hypothesis which states that there is no significant relationship between the use of

modern information technology devices and family interactions is consequently rejected. This implies that there is significant relationship between modern information technology use and family interaction.

Hypothesis Two: **This null hypothesis states that there is no significant relationship between the use of Modern Information Technology devices and Time family members spend together**

Table 4.11: Pearson Product Moment Correlation (PPMC) Statistics to Find relationship between the use of Modern Information Technology devices and Time family members spend together

Variables	N	Mean	S.D	Corr. Index r	Critical r	df	Sig 2-tailed
Use of modern information technology devices (MIT)	500	60.2040	8.36123	.805 **	.195	498	.000
on family interaction	500	11.6340	2.86364				

** Correlation is significant at the 0.01 level (2-tailed)

Results of the Pearson Product Moment Correlation (PPMC) statistics in Table 4.11 above revealed significant relationship between the use of modern information technology devices and the time family members spend together. This is because the calculated correlation index r .805 is higher than the critical r .195 while the calculated significance .000 is lower than the 0.01 level of tolerance confirming the presence of significant relationship between the two variables. Hence the null hypothesis stated above is hereby rejected. Therefore there is a significant relationship between modern information technology devices usage and time family spent together.

Hypothesis Three: This null hypothesis state that there is no significant relationship between the use of Modern Information Technology devices and family communication

Table 4.12: Pearson Product Moment Correlation (PPMC) Statistics to determine relationship between the use of Modern Information Technology devices and family communications

Variables	N	Mean	SD	Corr. Index r	Critical r	df	Sig 2-tailed
Use of modern information technology devices	500	60.2040	8.36123	.536 **	.195	498	.000
Family communications	500	15.7940	2.69259				

** Correlation is significant at the 0.01 level (2-tailed)

Outcome of the Pearson Product Moment Correlation (PPMC) statistics above showed that significant relationship exist between the use of modern information technology devices and family members communications because correlation index r .536 is greater than the .195 critical r, while the calculated Sig. (2-tailed) .000 is lower than the 0.01 level of tolerance. Hence, the null hypothesis which states that there is no significant relationship between the use of modern information technology devices and family communications is hereby rejected. This implies that significant relationship exist between modern information technology use and family communication.

Hypothesis Four: This null hypothesis states that there is no significant relationship between the use of Modern Information Technology devices and Parents attitude towards child socialization

Table 4.13: Pearson Product Moment Correlation (PPMC) Statistics to Determine the relationship between the use of Modern Information Technology devices and Parents attitude towards child socialization

Variables	N	Mean	S.D	Corr. Index r	Critical r	df	Sig 2-tailed
Use of modern information technology devices	250	45.2060	4.3210	.806 **	.195	248	.000
(MIT) on family interaction	250	15.2100	1.11001				

** Correlation is significant at the 0.01 level (2-tailed)

Table 4.13 is Pearson Product Moment Correlation (PPMC) statistics to determine if the there is significant relationship between the use of modern information technology devices and parents attitude towards child socialization. Result obtained is that the calculated correlation index r .806 is greater than the critical r .195 while the calculated Sig. 000 is less than the 0.01 level of tolerance.

Hence the null hypothesis which states that there is no significant relationship between the use of modern information technology devices and parents' attitude towards child socialization as perceived by family members is hereby rejected. This indicates that there is a significant relationship between the use of modern information technology devices and parents action towards socialization of children.

4.4 Discussion of Findings

The objective of this study was to look into the influence of modern information technology devices usage on family interaction in Adamawa State. A total of 500 respondents categorized into the composition and family size were used. In order to achieve the objectives of this research, five research questions as well as four null hypotheses were tested. This part of the chapter intends to discuss such findings as they agree or disagree with authors and sources quoted in the second chapter of this study.

Results of hypothesis one showed that significant relationship exist between the use of modern information technology devices and increases family interaction as according to Harris (2002), modern information technology devices has the potential to bring families together as they watch cabled television together. It was not surprising why over 84% of the respondents believe that modern information technology devices provide adequate opportunities for interaction among family members. This outcome also support what Magid (1998) opined that millions of people now go on-line to exchange mail surf the worldwide world internet and participate on chat groups. English-Lueck (1998) had similar views on family interaction being influenced as families stayed together watching television, camp and travel together.

It was concluded by the outcome of hypothesis two that the use of modern information technology devices has significant effect on the time family members spend together. The time spent together according to the respondents perception could be the time spend together watching television together as this enhances family

members, while the time spent using computer interferes with the time family members spent together. From any perspective, the use of modern information technology devices has significant effect on the time family members spent together. In line with the views of the respondents who believed that the use of modern information technology devices enhances family ties as most times are spent together watching television as Ridge (2002) said "modern information technology devices have created new ways for families to spend time together". On the other hand, to corroborate those who said that modern information technology devices interferes with the time family members spend together is Kraut et al (1998) they believed that internet use is associated with loneliness and depression as it brings about increased social disconnectedness.

According to the outcome of hypothesis three, modern information technology devices use, significantly affect family communications. That is, significant relationship exists between the use of modern information technology devices and family communications. This is inline with majority of the respondents view that modern information technology devices promotes effective communication among family members as majority of them representing 76% of the total sample also agreed that modern information technology devices promote open communication between parents and children. Communication has been observed as the most important relationship skill needed within the family so that information can be exchanged among family members to make life run smoothly. In line with this notion, Sasse (1993) who opined that connection is vital in keeping track of what family members

are doing Green (2001) believe along this line of argument when he observed that communication can keep family in contact when separated by long distances.

This is in contrast with Kraut el al (1998) who maintained that modern information technology devices have brought about decrease in communication between family members and slight increase in feeling of depression, as the use of Internet increases on the family. This is basic only to internet facilities as against other modern information technology devices which this study is considering.

The result of hypothesis four showed the existence of significant relationship between the use of modern information technology devices and parents attitude towards child socialization. Perhaps the relationship between both variables can be most appreciated as well as expected in other areas. The use of these modern information technology devices transfer both positive and negative information to the users which explains why over 91% of the respondents are of the view that parents need to teach their children that not all the information from modern information technology devices are reliable, while 77% of the respondents agreed that parents therefore need to discuss every information on cable television and internet to suit the moral upbringing of their children. Parents are advised to discuss the negative effects of pornography, indecent moral programs from the internet/cable television on the children issue.

The study revealed that significant relationship exist between the use of modern information technology devices such as computers television, internets, cell-phones and family interactions, time spent together by family members, family communications and parents attitude towards child socialization in all the four tested

hypotheses. Over 64% and 69% of the respondents use modern information technology devices for educational purposes and games purposes respectively. Cell phones television and personal computers are the major types of modern information technology devices used by family members. Modern information technology devices provide adequate opportunities for interaction among family members. Use of modern information technology devices like Internet interferes with the time family members spent together, while use of devices like cable television enhances family ties as they spend time watching cable television together. Modern information technology devices promote effective communication among the family members.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

This chapter contains the summary conclusion and recommendations for the research under the following subheadings:

5.1 Summary

5.2 Conclusion

5.3 Recommendation

5.4 Limitation of the Study

5.5 Suggestion for further Study

5.1 Summary

The study examined the relationship between modern information technology devices usage and family interaction, communication, family togetherness and parents' actions towards child socialization. The major objective was to determine the influence of modern information technology usage on family interaction in Adamawa State. While the specific objectives examined MIT influence on communication, family time together and child socialization.

The review of literature highlighted among others: Concept of family, concept and components of modern information technology devices, and influence of modern information. Survey research design was adopted in carrying out this study, with a population of six thousand nine hundred and five (5,049) obtained from seven (7) tertiary institutions, which gave a sample size of five hundred (500) respondents from

one hundred and twenty five (125) households constituting of four members; parents and children. A questionnaire was developed.

Five research questions were formulated and four null hypotheses were postulated. The four null hypotheses were tested at 0.01 (.000) level of significance. The statistical technique used was Pearson Product Moment Correlation (PPMC).

The findings revealed that:

1. Significant relationship exist between modern information technology usage and family interaction. This implies that MIT devices usage could be considered as a factor that influences family interaction.
2. The study also showed that there is significant relationship between MIT devices usage and time family members spend together as they watch cabled television, and use the computer or surf the webs.
3. On the issue of communication, result reveals that the use of MIT devices and family communication are significantly related as cell-phone had improved the quality of family communication.
4. Findings showed the existence of significant relationship between the use of MIT devices and parents' action towards socialization of their children. This implies that parents discussed every information on cabled television and internet to suit the moral upbringing of their children and their religious beliefs.

5.2 Conclusion

Based on the findings in this study and the interpretation of tables, it was concluded that significant relationship exist between the use of modern information technology devices such as computers, television, internet, cell phones and family interactions, family time together, family communication and parents attitudes towards children socialization. The findings also revealed that families in Adamawa State have strong bonds and are not adversely affected by the presence of modern information technology devices. Rather the modern information technology in homes, facilitate family interactions by increasing the level of togetherness, communication and child socialization.

5.3 Recommendations

1. Families should not allow the use of MIT devices by individuals, rather devices should be placed centrally for collective use within the family.
2. Parents should teach children to watch television programmes which encourage pro-social behaviours, such as sharing and helping with others.
3. Limits should be set on the use of cyber café on family members in order to reduce the amount of time used outside the home.
4. Family members should have more of face-to-face communication rather than encouraging the use of cell-phones and internet.

By implication, the findings of this research will be of vital importance to education and family life. If effectively used, modern information technology devices,

in the area of education will bring awareness in every level of education (Nursery to tertiary education), as they offer opportunities for direct communications and promote social interactions previously limited by location of participating learners. Young children can interact with children in other classrooms, cities, states and even countries. The study has revealed the influence of the use of modern information technology devices by families. The study will go a long way to improve and strengthen family interactions.

5.4 Suggestions for Further Study

1. Influence of modern information technology devices usage on family interaction in other states of Nigeria.
2. Influence of modern information technology usage on domestic activities among working mothers and none working members.
3. Influence of MIT devices on economic productivity of civil servant, private establishment and personal businesses.
4. Influence of MIT on consumer behaviour on the purchase of household articles.

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APPENDIX I

Department of Voc. and Tech. Education,
(Home Economics Section)
Faculty of Education
Ahmadu Bello University, Zaria

Dear Sir/Madam

QUESTIONNAIRE

I am a postgraduate student in the above-mentioned institution, currently conducting a research on the topic **"Influence of Modern Information Technology (MIT) Devices Usage on Family Interactions in Adamawa State".**

I implore you to go through the following questions and tick the appropriate options provided or supply the information required as the case may be.

You are assured that your responses will be treated with utmost confidentiality and would be used only for the purposes of this research.

Thank you for your cooperation.

Sincerely yours,

Filibus F. Sarah (Mrs.)

APPENDIX II

SECTION A

PART I: RESPONDENTS BIODATA

Instruction: Please give the response as it applies to you by ticking (√) the appropriate option.

1. Sex: Male ( ) Female ( )
2. Position in the family: Father ( ) Mother ( ) Child ( )
3. Number of Family members:
   (a) 1 – 4 ( )
   (b) 5 – 8 ( )
   (c) 9 and above ( )

PART II: AVAILABILITY, TYPES AND USAGE OF MODERN INFORMATION TECHNOLOGY DEVICES WITHIN A HOUSEHOLD

4. Types of modern information technology device(s) used in your household:
   i. Personal Computer ( ) ii. Internet ( ) iii. Cell-phone ( ) iv. Cabled television ( ) v. All of the above ( )
5. Frequency of Modern information Technology use:-
   i. Often ( ) ii. Rarely ( ) iii. Frequently ( ) iv. Very Frequently ()
6. Specific reasons for which Modern Information Technology (MIT) devices are used:
   Entertainment ( ) News report ( ) Educational purposes ( )
   Games ( ) Communicate with family members ( )
   Chat with friends ( ) All of the above ( )

Instruction: Please tick (√) the appropriate column that suits your assessment.

SA = Strongly Agreed

A = Agreed

D = Disagreed

SD = Strongly Disagreed

1. SECTION A: THE USE OF MODERN INFORMATION TECHNOLOGY DEVICES AND FAMILY INTERACTION

S/N		SA	A	D	SD
1	Modern Information Technology device provide adequate opportunities for interaction among family members.				
2	Modern Information Technology devices improve family relationship as they promote parent-child interaction.				
3	Using multiple Modern Information Technology devices reduces face-to-face interaction among family members.				
4	The use of Modern Information Technology devices have negative affects on husband and wife interaction. Spouses tend to interact more with the devices than with each other.				
5	Receiving and making calls interrupt the flow of work and family time (use of cell or mobile phones).				

2. SECTION B: INFLUENCE OF MODERN INFORMATION TECHNOLOGY DEVICES ON THE TIME FAMILY MEMBERS SPEND TOGETHER

S/N		SA	A	D	SD
1	The use of Modern Information Technology devices e.g. personal computer interferes with the time family members spend together.				
2	Prolong use of Modern Information Technology devices deprive family members of the opportunities to interact.				
3	The use of Modern Information Technology devices enhance the family ties as they spend time and watch together.				
4	Other family members prefer to spend most of their time out surfing the Internet than being at home with other family members.				

3. SECTION C: THE USE OF MODERN INFORMATION TECHNOLOGY DEVICES AND FAMILY COMMUNICATION

S/N		SA	A	D	SD
1	Using Modern Information Technology devices lessens face-to-face communication among family members.				
2	Modern Information Technology devices have hindered frequent face to face family interaction				
3	Modern Information Technology devices promote effective communication among family members.				
4	Modern Information Technology promotes open communication between parents and children.				
5	Communication with family members is faster and more frequent with the use of MIT devices e.g. cell phone and internet.				

4. SECTION D: THE USE OF MODERN INFORMATION TECHNOLOGY DEVICES AND PARENTS ATTITUDE TOWARDS CHILD SOCIALIZATION

S/N		SA	A	D	SD
1	Usage of Modern Information Technology devices has positively affected the way parents train their children on religious matters.				
2	Use of Modern Information Technology devices enables children to share ideas with their parents.				
3	Parents need to teach their children that not all information's on or from Modern Information Technology devices are reliable.				
4	Parents need to discuss information on cabled television and internet to suit the moral upbringing of their children.				
5	Parents need to monitor the types of programme their children watch, and where they go while online.				
6	Parents need to set limit for their children as they use each MIT device.				

APPENDIX III

Local Government Areas and their Population

Local Government area	Population	Household
Demsa	180251	31,766
Fufore	207287	14,534
Ganye	164087	20,000
Gombi	146429	16,974
Guyuk	177785	14,326
Girei	129995	16,250
Hong	169126	21,665
Jada	168473	2468
Lamurde	112803	22276
Madagali	134827	16,727
Maiha	111215	15,926
Michika	155302	21,953
Mubi North	151072	24,065
Mubi South	128937	22,032
Mayo-Belwa	153129	24,937
Numan	90723	21,403
Song	192697	22,140
Shelleng	149069	10,000
Toungo	52040	7943
Yola North	198247	21,466
Yola South	199607	16040
Total	**3168101**	**406,683**

Sources: - Federal Republic of Nigeria Gazette (2007) No 20 Vol.94 Population Totals 2006 Census and National Population Commission, Census 1991 National Summary November, 1994