

THE CULTURE  
IN ISLANDIC PARSONAGES

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# **E-COMMERCE IN ISLAMIC PERSPECTIVES**

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*Dedicated to Ma and Abah,  
millions of thankful for all the supports and confidence  
that you lay in my heart,  
May Allah bless you ever after...amen.*

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## **CHAPTER 1: INTRODUCTION**

**1.1 Research Background**

**1.2 Research Objectives**

**1.3 Significant of the Research**

**1.4 Report Organization**

## **1.1 RESEARCH BACKGROUND**

Online commerce is still new enough that participants are still trying to get a handle on how the rules of commercial interaction apply to this new medium. Considering the newness of the internet and world wide web, it is safe to say that nearly everyone who has purchased online gained their understanding of commerce offline. People nowadays tend to take the opportunity to manipulate all the advantages of the latest invention technologies particularly in the field of telecommunications and cyberspace. There is only a little percentage of people that put their attention on 'what the Islamic Law would say for the transaction process occurred via internet?' The main concerns are whether it is accommodated or can be applied according to the jurisprudence stated in the Qur'an and Hadith, and whether it is parallel to the Islamic concept of trade and commerce as stated in the Holy Qur'an,

*(Quran 2:275-279). Those who feed on usury [lending money at an immoral rate of interest] will not rise again [on the Day of Judgment], but will be as those whom the Devil has overthrown by his touch.*

In this research paper, I will try to observe the complete meaning of electronic commerce concepts and its business procedures that is handle via the internet. Along with that information, I will also include the comparison between electronic commerce and traditional commerce. After that, we can study the basic concept of Islamic trade and its perception in various types of business. Based on this information, analysis will be made according to the Islamic transaction jurisprudence to determine whether electronic commerce certainly accommodate the principles of 'Mualamah'.

The methodologies of this research so far mainly from the sources in libraries such as text books, journals and articles as well as internet websites and interviews with the qualified person. Most of the main information about the electronic commerce gained from the internet websites and books. Whereas the information about the offline trade and Islamic transactions are the compilation of finding form the articles, magazines, journals and books in the libraries.



## **1.2 RESEARCH OBJECTIVES**

The main objective of this research is to analyze whether the electronic commerce can accommodate or can be applied in the principles of Islamic transaction. It is commonly known in Islamic business concept strictly said that one should be very Faithful and God-fearing in any kind of Business or Trade. As stated in the Quran,

*God has permitted trade and forbidden usury. He to whom there comes an admonition from his Lord, and who desists, may keep his past gains, and his case is with God, but those who revert will be dwellers in hellfire for evermore. God will nullify usury and fructify alms, for God does not love any sinful unbelievers. (Al-Baqarah: 275)*

According to those ayah quoted from Quran, it is proven that Islam takes very seriously on the way we handle daily business and gaining profits in order to obtain pleasures in the hereafter. From the time of prophet Muhammad s.a.w, the law of Islamic transaction had been discussed and it continued gradually by the companions and tabi'in.

In this research paper, I will also include the findings of my interview session with Dr. Ma'sum Billah who generously contributes his knowledge on this particular issue as well as some observations and analysis on the basic principles of Islamic trade. By this way we can have a chance to study the actual business methods implemented by electronic commerce and detect any particular procedure which may against Islamic transaction principles.

And these days, as the rapid growth in telecommunication system and the invention of new business trend through the internet had made possible all the dreams before. Through this research, I intend to attempt to answer some of the curiosity and doubt ness that linger in most Muslims mind on the validity of electronic commerce concept from the Islamic perspective. I hope this effort will help our ummah to achieve a better understanding on Islamic business trend in order to gain prosperity along and blessings of Allah.

### **1.3 SIGNIFICANCE OF THE RESEARCH**

This research paper may give the new impression on the world of cyber trade as it tries to analyze the implementation of electronic business as a whole in the different point of view. I hope this effort will give a special contribution in the Islamic economic development as whole and especially in the new invention era of Islamic cyber world. I believe that Muslims community in Malaysia nowadays is very concern on the concept of 'halal' and 'haram' in our daily business, and the existence of new invention of electronic commerce will not be exceptional. Those two terms, 'halal' or 'haram' on electronic commerce will be in question mark time after time until it is clarified clearly.

After all these efforts and researches, sadly say that only a few number of Muslims put their interest on the validity of electronic commerce based on Islamic mu'amalah. Those concepts on 'Cyber Law' generally have been made based on conventional system being implemented in United States and modified some part to accommodate with Malaysian styles.

May this complete analysis on electronic commerce transaction will be the 'entrance door' for the more valuable invention of Islamic cyber application in the future. Malaysian IT professionals and expertise may be the best inventor in the area of artificial intelligence and the first inventor of the effective way to expand Islamic way of life.

## **1.4 REPORT ORGANIZATION**

This research paper consists of six chapters and those parts are (I) *introduction*, (II) *literature review*, (III) *literature review on Islamic concept of trade*, (IV) *research methodology*, (V) *analysis and* (VI) *conclusion*. I started this research in the second week of August, 2000. Under the supervision of my supervisor, Dr. Husnayati, I managed to achieve the clear objectives to work for this thesis statement, "Electronic Commerce from the Islamic Perspective". For about three months I managed to collect the important information related to my thesis and at last I could say that I've found so many valuable things to my knowledge in this area.

Basically, chapter 1 of my report provides an overview of the thesis as a whole and I begin with introduction that explained briefly about the thesis statement's focus generally and it followed by the description on the objectives of the research. Abstract explanation of my vision and aim on this research paper had been summarized in the sub topic called significance of the research.

Chapter 2 of the report covers the literature survey where the complete explanation of the important term is placed. This part consists of the meaning of internet electronic commerce, comparison between electronic commerce and traditional commerce, comparison between electronic commerce and EDI, benefits of electronic commerce and the conclusion.

The major coverage on the Islamic point of view is explained in the chapter 3 of the report. This chapter covers the literature review and explanation on the basic principles of Islamic concepts of trade. I begin this chapter with a little introduction that may help readers to see the flow of the explanation from the previous chapter and gain the better understanding on Islamic tawhidic worldview. The main attractions in this chapter would be focused on the description of trade in Islam followed by the explanation on their basic principles.

All the findings and how I all the information will be collected is explained in the chapter 4 of the report. In fact, there are three methods that I have used to work for this thesis, sources from libraries, internet search engines and interviews. On the middle of semester II, I managed to have an interview session with Dr Ma'sum Billah, Assistant

Professor of Law at Department of Business Administration, International Islamic University Malaysia. I could say that this was a turning point for me to reach to the clear conclusions for this thesis project. He helped a lot on figuring out for me the real situations in electronic commerce implementation particularly in Malaysia.

Analysis part is placed in the fifth chapter of the report and this chapter giving an important role to provide the complete explanation on the Islamic trade principles along with the application on electronic commerce activities. In fact, I faced a major problem in analyzing the transaction procedure of online company, it is due to the fact that I didn't found the accurate methods or guidance on evaluating a good online company i.e. Dell Corporation and Royal Selangor.

Final chapter of the report provides the explanation on my major findings and some ideas on the implication of electronic commerce for practitioners.

## **CHAPTER 2 : LITERATURE REVIEW**

- 2.1 Introduction**
- 2.2 Internet**
- 2.3 Definition of E-Commerce**
- 2.4 Classification of electronic commerce field**
- 2.5 E-Commerce vs Traditional Commerce**
- 2.6 E-Commerce vs EDI**
- 2.7 Benefits of E-Commerce**
- 2.8 Financial Issue of E-Commerce**
- 2.9 Conclusion**

## **2.1 INTRODUCTION**

Nowadays, the development of cyber world could allow us to do many things through the internet; purchase software, book holidays, access bond and stock transactions includes read about the issues, the threats and developments of this powerful tool. The term of e-commerce is not new anymore to many people all over the world especially for computer maniacs who tend to stick in front of their PC for hours. Most people think that e-commerce means online shopping – workaholics may pointing their browsers to **Amazon.com** to order an emergency present because they've forgotten someone's birthday again.

Basically, this chapter will explain on the literal meaning of internet and the definition of electronic commerce as well as the types of electronic commerce. Then I will include the comparison between electronic commerce and traditional commerce as commonly understood. Followed by the benefits of electronic commerce activities compared to the old common transaction system. This chapter will also provide the analysis on some financial issues related to electronic commerce activities.

## **2.2 INTERNET**

The Internet is the name for a group of worldwide information resources. (Hahn, Stout,2000) It is a network of networks. (Greenstein, Feinman, 2000). These resources are so vast as to be well beyond the comprehension of a single human being. The roots of the Internet lie in a collection of computer networks that were developed in the 1970s. They started with a network called the Arpanet that was sponsored by the United States Department of Defense. (Hahn, Stout;2000) These nodes transferred data using the packet switching theory first developed by Leonard Kleinrock at MIT. The same packet switching theory is still the basis of today's data transfer methods. (Greenstein and Feinman, 2000). The original Arpanet has long since been expanded and replaced, and today its descendents form the global backbone of what we call the Internet. (Hahn,

Stout,2000) The Internet allows millions of people all over the world to communicate and to share, e.g. by sending or receiving electronic mail. The Internet is much more than a computer network or an information service. The Internet is living proof that human beings who are able to communicate freely and conveniently will choose to be social and selfless. The Internet is the first global forum and the first global library. Anyone can participate, at any time: the Internet never closes. Moreover, no matter who you are, you are always welcome as nobody become the leader and nobody actually 'runs' the Internet. Nobody is 'in charge' and no single organization pays the cost. The Internet has no laws, no police, and no army. (Hahn, Stout,2000)

In my opinion, Internet is simply known as the use of computers which are connected to a global network environment. (O'Daniel, 2000). A worldwide information resources which has no any single leader or organization.

### 2.2.1 THE FOUR IMPORTANT SERVICES PROVIDED BY INTERNET

The software that supports the Internet provides a large number of technical services upon which everything else is built. Most of these services operate behind the scenes.

1. **The mail** service reliably transmits and receives messages. Each message is sent from one computer to another on its way to a final destination. Behind the scenes, the mail service ensures that the message arrives intact at the correct address.
2. **Telnet**. It allows someone to establish a terminal session with a remote computer. For instance, he/she can use Telnet to connect to a host on the other side of the world. Once the connection is made, he/she can log in to that computer in the regular manner. (user account and password are needed). Telnet allows two programs to work cooperatively by exchanging data over the Internet.
3. **FTP (file transfer protocol)**. FTP allows someone to transfer files from one computer to another. Most of the time, FTP can be used to copy a file from a remote host to your computer. This process is called downloading. However,

it allows someone to transfer files from his/her computer to a remote host. This is called uploading. In addition, FTP will allow someone to copy files from one remote host to another.

4. **General client/server.** A client program can connect to another computer and ask for the help of a server program. For instance, the Gopher system. The Gopher client will displays a menu for a user. When he/she make a selection from the menu, the client connects to the appropriate server, no matter where it is on the Internet and procures the service you requested. (Hahn, Stout;2000)

### 2.2.2 SEVERAL INTERNET RESOURCES

#### 1. ELECTRONIC MAIL

Users of Internet can send and receive messages from anyone else on the Internet. Moreover, users can do the same for other mail systems such as CompuServe or MCI Mail that have connections with the Internet. Mail is simply means personal messages. Anything that can be stored in a text file can be mailed: computer (source) programs, announcements, electronic magazines, and so on. There are facilities for encoding the data into text when someone needs to send a binary file that cannot be represented as regular text such as graphical pictures. At the other end, the recipient simply decodes the textual data into its original format. The Internet mail system is the backbone and original motivation for the network itself.

#### 2. REMOTE LOGIN

In the remote login we need to enter a secret code to prove the correct or authorized user. It is called password. The name by which an account is known is called a userid. As long as a user has a valid userid and password, he/she can log in to any computer on the Internet. Once the connection is established, the user can log in as long as he/she has a valid account on that computer. As a public service, many Internet system are set up to allow anybody to log in using a special guest account. For



instance, in the United States, there is a system that will display weather reports from around the country. Anyone can log in to his system and check out the weather.

### **3. FINGER SERVICE**

Finger service is facility offered by most Internet computers that allows user to ask for information about another particular user. People on the Internet are often known by their userid. User can use finger to find out the name of the person behind the userid. For instance, a user might find out that the userid **hakim** is registered to Hakim Hamidi. Depending on how the finger service has been set up on the computer contacted by particular user, user may be able to find out other information about the person: phone number, office address, and so on. In addition, some finger systems will tell the user when the person last logged in and if they have unread mail. This can come in handy when the user needs to check if someone has received an important message. User can also finger a computer rather than a userid. In this case, the computer will respond by showing user a summary of all the userids currently logged in. Finally, some systems use finger to support a public request for certain specific information. For instance, there is a particular userid and computer at the International Islamic University at Selangor that user can fingers to display information about recent earthquakes.

### **4. USENET**

Usenet is derived from User's Network, it is one of the main reasons people use the Internet. Usenet itself is not an actual network. It is a system of discussion groups in which individual articles are distributed throughout the world. Usenet has literally thousands of discussion groups, so there is definitely something for everyone. At each Internet site, the system administrator decides whether or not to carry the Usenet discussion groups. Thus, Usenet is not available everywhere. Moreover, even sites that do provide this resource will not carry every conceivable discussion group.

### **5. ANONYMOUS FTP**

FTP service allows user to copy files from one computer to another. anonymous FTP is a system in which an organization makes certain files available to the general

public. User can access such a computer by using a userid of anonymous. No special password is required. Anonymous FTP is one of the most important Internet service. Virtually every possible type of data is stored somewhere, on some computer, and it is all available to you for free. User can find electronic magazines, archives of Usenet discussion groups, technical documentation and much more. As a full-fledged Internet user, anybody will come to depend heavily on Anonymous FTP.

## 6. INTERNET RELAY CHAT

Internet Relay Chat (IRC) is like a Talk facility for more than one person at the same time. As user might imagine, IRC is used heavily and offers a lot more than simple conversation. User can take part in public conversation with a large number of people. These conversations are loosely organized around various topics or ideas. Alternatively, user can use IRC to arrange a private conversation with people of his own choosing, much like a telephone conference call.

## 7. WORLD WIDE WEB

The World Wide Web often called 'the Web' is a hypertext-based tool that allows user to retrieve and display data based on keyword searches. Data that contains links to other data makes the Web so powerful. For example, user is reading some information, he/she will notice that certain words and phrases are marked in a special way. He/she can tell the Web to jump to one of those words. It will follow the link, find the relevant information, and display it. In this way, user can jump from place to place, following logical links in the data. (Hahn, Stout; 2000)

## **2.3 DEFINITION ON ELECTRONIC COMMERCE**

Electronic commerce or EC is usefully defined as **the conduct of commerce in goods and services, with the assistance of telecommunications and telecommunications-based tools** (Clarke, 1999) Some people use the term **electronic trading** to mean much the same thing. Others use **electronic procurement, electronic purchasing or electronic marketing** (<http://future.sri.com/ecomms.html>). It is a conduct

of a financial transaction by electronic means. With the growth of commerce on the Internet and the Web, electronic commerce often refers to **purchases from online stores on the Web**, otherwise known as e-commerce Web sites. They may also be referred to as **virtual-stores** or **Cyber stores**. Since the transaction goes through the Internet and the Web, some have suggested another term: **I-commerce** (Internet commerce), or **icommerce**. Few have referred to it as **Web-commerce** (StorePartners.com). E-Commerce is simply another term for on-line shopping. It is a great way for manufacturers to sell direct to the public, for start up businesses to sell their products, or for existing retailers to expand their presence beyond their geographical location (<http://www.cba.bgsu.edu/ijec>). Electronic commerce is about doing business electronically. It is based on the electronic processing and transmission of data, including text, sound and video. It encompasses many diverse activities including electronic trading of goods and services, online delivery of digital content, electronic fund transfers, electronic share trading, electronic bills of lading, commercial auctions, collaborative design and engineering, online sourcing, public procurement, direct consumer marketing, and after-sales service. It involves both products (e.g. consumer goods, specialized medical equipment) and services (e.g. information services, financial and legal services); traditional activities (e.g. health care, education) and new activities (e.g. virtual malls). (<http://www.e.com.ec/necc/>)

In fact, the definition of electronic commerce is depending on whom you ask, it has different definitions;

- From a **communication** perspective, electronic commerce is the delivery of information, products or services, or payments via telephone lines, computer networks, or any other means.
- From a **business process** perspective, electronic commerce is the application of technology toward the automation of business transactions and workflows.
- From a **service** perspective, electronic commerce is a tool that addresses the desire of firms, consumers, and management to cut service costs while improving the quality of goods and increasing the speed of service delivery.

- From an **online** perspective, electronic commerce provides the capability of buying and selling products and information on the Internet and other online services (*Kalakota R., 1997*)

All of the above definitions are accepted. It is just a matter of which lens is used to view the electronic commerce landscape. Broadly speaking, electronic commerce emphasizes the generation and exploitation of new business opportunities and, to use popular phrase: “generate business value” or “do more with less”.

Electronic commerce endeavors to improve the execution of business transactions over various networks. These improvements may result in more effective performance (better quality, greater customer satisfaction, and better corporate decision making), greater economic efficiency (lower cost), and more rapid exchange (high speed, accelerated, or real-time interaction). More specifically, electronic commerce enables the execution of information-laden transactions between two or more parties using interconnected networks. These networks can be a combination of POTS (plain old telephone system), cable TV, leased lines, and wireless. Information-based transactions are creating new ways of doing business and even new types of business (*Kalakota R., 1997*).

Electronic commerce can support most of the processes involved in the purchasing of physical goods and services. Digital goods and services are those that can be delivered using the information infrastructure. Hence, for digital goods and services, the **marketspace** provides a context sufficient for the entire procurement process. The concept of **marketspace** is used to distinguish the 'location' in which electronic commerce is conducted, from conventional, physical marketplaces. It refers to a virtual context in which buyers and sellers discover one another, and transact business. It is a working environment that arises from the complex of increasingly rich and mature telecommunications-based services and tools, and the underlying information infrastructure. (*News Articles@ITP*). A product can be physical or digital, an agent can be physical or digital, and the process can be physical or digital, in traditional commerce all entities involved are physical, and in pure electronic commerce all entities involved are digital and it could be also mix of physical and digital entities. For example, buying a silver spoon from [www.royal Selangor.com](http://www.royal Selangor.com) is not pure, because the spoon is delivered by

mail such as FedEx. However, buying software from [www.dell.com](http://www.dell.com) is pure electronic commerce because the delivery, payment and agent are digital. Electronic commerce uses several technologies ranging from EDI to e-mail. For instance, buying food from a vending machine using a smart card also be viewed as electronic commerce. (O'Daniel, 2000).

Digital goods and services include:

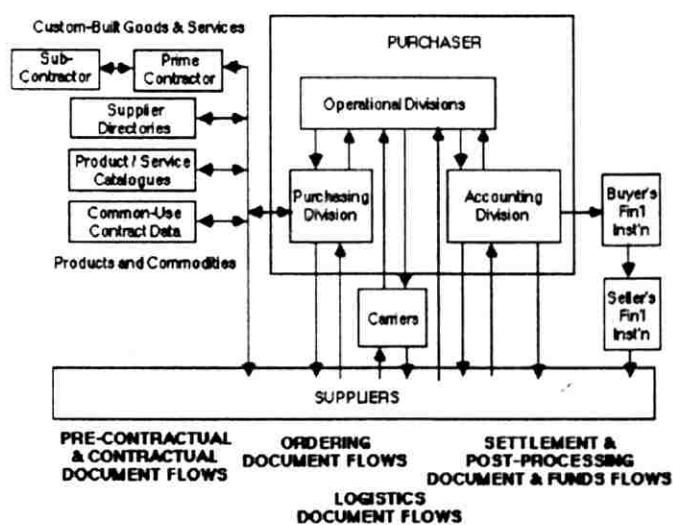
- data, including statistics;
- documents, including articles and books;
- reference information, including dictionaries and encyclopaedias;
- news;
- weather forecasts;
- projected sound, such as speeches and musical performances;
- projected video and video-with-sound, including television, video conferencing and video-clips; and interactive voice, such as telephone conversations and tele-conferencing;
- interactive video and video-with-sound, such as video-conferencing;
- images, including structured graphics such as diagrams and musical scores, and photographs;
- entertainment, infotainment, edutainment and education via multi-media;
- bookings and tickets for live events;
- software, quite generally;
- commerce in insurance;
- commerce in money, including foreign currencies;
- commerce in securities, and financial derivatives such as stock-based, interest-rate-based and index-based options; and
- commerce in commodities, and commodities derivatives such as futures.

(News [Articles@ITP](mailto:Articles@ITP))

Electronic services delivery is usefully defined as electronic commerce in services, i.e. the provision of services with the assistance of telecommunications and telecommunications-based tools ESD excludes the question of traffic in physical goods, and hence is concerned with applications of electronic business where, at least in principle, the entire activity can be performed electronically. The term is commonly used to refer to government applications of EC. It is also used in relation to such industry sectors as banking and other financial services, trading in commodities, reservations for travel and entertainment events, and distance education. (News [Articles@ITP](mailto:Articles@ITP)).

### ➤ Deliberative Purchasing

The term 'deliberative purchasing' to refer to the kind of process practised by corporations when they undertake major acquisitions. The following diagram provides an abstract (and of course idealized) description of the processes involved.



Sources: (Clarke, <http://www.anu.edu.au>)

Deliberative purchasing can be depicted as a succession of phases, described below. In many real-world cases these Phases are readily identifiable, although in some circumstances some of them may be merged, or may occur in a different sequence. Nonetheless this model proves very useful when analysing the application of particular information technologies to electronic commerce.

### **(1) The Pre-Contractual Phase**

At the commencement of the process, the buyer and seller are concerned with the gathering of market intelligence. The buyer seeks information about suppliers of goods and services, about the goods and services themselves, and about the prices, availability, terms and conditions applicable to a purchase. The seller seeks information about prospective purchasers of their goods and services. This is the area commonly referred to as 'marketing', including advertising.

### **(2) The Contractual Phase**

During this phase, a formal relationship is established between buyer and seller, including terms and conditions to be applied to transactions under the contract. In some cases, only a single transaction is envisaged, and hence these activities are likely to merge with those of the following phase; in other cases, many orders may be placed within the context of a single 'head' contract, and hence it is useful to separate the activities into two phases.

### **(3) The Ordering Phase**

This involves the placement and processing of purchase orders (or, in contractual terms, an offer), and acknowledgement by the seller of its preparedness to deliver (in contractual terms, an acceptance). Other transactions that may involve include purchase order amendments, re-negotiations and cancellations.

### **(4) The Logistics Phase**

This phase deals with the delivery of goods and/or the performance of services. In addition, some post-delivery functions maybe involved, in particular inspection, and acceptance or rejection.

### **(5) The Settlement Phase**

During this phase, the goods or services are paid for. Relevant transactions include invoicing, payment authorization, payment, and remittance advice transmission. Particularly in the case of contracts that involve cyclical deliveries or service

performance (e.g. the hiring of temporary or contract staff for an extended period), a succession of payments may be involved. Associated with this phase is the provision by financial institutions to their customers of confirmations of transactions affecting their accounts, and statements of transactions and balance.

#### **(6) The Post-Processing Phase**

After the basic transaction has been completed, a number of additional activities may be undertaken. Most commonly, management information is gathered and reported. In some cases, an obligation may exist to store and report trading statistics to an industry association or a national statistical authority. In addition, the sale may have resulted in a relationship between the buyer and the seller, relating to the servicing, maintenance, upgrading and eventual replacement of the goods or asset (e.g. a photocopying or fax machine), or the replenishment of supplies used by the asset (e.g. paper and ink-cassettes). This six-phase model has the advantage of ensuring rational and effective procurement. In return for those advantages, however, it is resource-intensive and expensive. (Clarke, 1999)

As a conclusion, I would agree on the concept of electronic commerce or EC as conduct of commerce in goods and services, with the assistance of telecommunications and telecommunications-based tools. It also can be considered as a conduct of a financial transaction by electronic means. In other words, electronic commerce often refers to purchases from online stores on the Web, or commonly known as e-commerce Web sites.

## **2.4 CLASSIFICATION OF ELECTRONIC COMMERCE (EC)**

### **FIELD**

A common classification of electronic commerce (EC) is by nature of transaction. Those categories are as follow;

1. **B2B or Business-to-Business:** Most of EC today is of this type. It includes the IOS (a unified system encompassing several business partners where buyers and sellers arrange routine business transaction) transactions described earlier and electronic market transaction between organizations.